

SEQUENCE LISTING

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Rozanne Lee
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Giorgio Senaldi
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<120> ANTIBODIES DIRECTED TO TUMOR NECROSIS
FACTOR AND USES THEREOF

<130> ABGENIX.073A

<140> Unknown
<141> 2003-12-02

<150> 60/430729
<151> 2002-12-02

<160> 320

<170> FastSEQ for Windows Version 4.0

<210> 1
<211> 384
<212> DNA
<213> Homo sapiens

<400> 1
caggtgcagt tgcaggagtc gggcccagga ctggtaaagc cttcacagac cctgtccctc 60
acctgcactg tctctgggtt ctccatcagc agtggtggtt actactggag ctggatccgc 120
cagcacccag ggaagggcct ggagtggtt gggAACATCT attacagtgg gggcacctac 180
tacaacccgt ccctcaagag tcgagttacc atatcagtag acacgtctaa gaaccagttc 240
tccctgaagc tgagctctgt gactgccgcg gacacggccg tgtattactg tgccgagagat 300
agtaaccaat ataactggaa cgacgaggtc tacgactacg gtttggacgt ctggggccaa 360
gggaccacgg tcaccgtgtc ctca 384

<210> 2
<211> 128
<212> PRT
<213> Homo sapiens

<400> 2
Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Gln
1 5 10 15
Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Gly

20	25	30	
Gly Tyr Tyr Trp Ser Trp Ile Arg Gln His Pro Gly Lys	Gly Leu Glu		
35	40	45	
Trp Ile Gly Asn Ile Tyr Tyr Ser Gly Ser Thr Tyr Tyr	Asn Pro Ser		
50	55	60	
Leu Lys Ser Arg Val Thr Ile Ser Val Asp Thr Ser Lys	Asn Gln Phe		
65	70	75	80
Ser Leu Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala	Val Tyr Tyr		
85	90	95	
Cys Ala Arg Asp Ser Asn Gln Tyr Asn Trp Asn Asp Glu	Val Tyr Asp		
100	105	110	
Tyr Gly Leu Asp Val Trp Gly Gln Gly Thr Thr Val Thr	Val Ser Ser		
115	120	125	

<210> 3
<211> 321
<212> DNA
<213> Homo sapiens

<400> 3
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atcaacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggtatc tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacaa cataataatt accctctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 4
<211> 107
<212> PRT
<213> Homo sapiens

<400> 4
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Asn Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 5
<211> 375
<212> DNA
<213> Homo sapiens

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tcctgtgcag cgtctggatt cacttcagt agctatgaca ttcaactgggt ccggcaggct 120
ccaggaagg ggctggagtg ggtggcagtt atatggatg atgaaagtat taaatactat 180

gcagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctacaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagaggag 300
cagctcgatcc ggggagggtt ctactactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 6
<211> 125
<212> PRT
<213> Homo sapiens

<400> 6
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Asp Ile His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Ile Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Glu Gln Leu Val Arg Gly Gly Tyr Tyr Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 7
<211> 321
<212> DNA
<213> Homo sapiens

<400> 7
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gggaaagccc ctaagcgctt gatctatgct gcatccagtt tgcaaagtgg ggtcccgatca 180
agtttcagcg gcagtggatc tggccagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 8
<211> 107
<212> PRT
<213> Homo sapiens

<400> 8
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1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Pro Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu

85 90 95
Thr Phe Gly Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 9
<211> 384
<212> DNA
<213> Homo sapiens

<400> 9
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acctgcactg tctctgggtt ctccatcagc agtgggtggtt actactggag ctggatccgc 120
cagcacccag ggaagggcct ggagtggtt gggAACATCT attacagtgg gggcacctac 180
tacaacccgt ccctcaagag tcgagttacc atatcagtag acacgtctaa gaaccagg 240
tccctgaagc tgagctctgt gactgcccgg gacacggccg tgtattactg tgcgagagat 300
agtaaccaat ataactggaa cgacgaggc tacgactacg gtttggacgt ctggggccaa 360
gggaccacgg tcaccgtgtc ctca 384

<210> 10
<211> 128
<212> PRT
<213> Homo sapiens

<400> 10
Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Gln
1 5 10 15
Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Gly
20 25 30
Gly Tyr Tyr Trp Ser Trp Ile Arg Gln His Pro Gly Lys Gly Leu Glu
35 40 45
Trp Ile Gly Asn Ile Tyr Tyr Ser Gly Ser Thr Tyr Tyr Asn Pro Ser
50 55 60
Leu Lys Ser Arg Val Thr Ile Ser Val Asp Thr Ser Lys Asn Gln Phe
65 70 75 80
Ser Leu Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr
85 90 95
Cys Ala Arg Asp Ser Asn Gln Tyr Asn Trp Asn Asp Glu Val Tyr Asp
100 105 110
Tyr Gly Leu Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 11
<211> 321
<212> DNA
<213> Homo sapiens

<400> 11
gacatccaga tgaccaggc tccatcctcc ctgtctgcatt ctgttaagaga cagagtccacc 60
atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagg ttgcaaaatgg ggtccatca 180
aggttcagcg gcagtggatc tgggacagaa ttcaactctca caatcagcag cctgcagcct 240
gaagatttttcaacttattt ctgtctacag cataatagtt accctctcac tttcggccga 300
gggaccaagg tggagatcaa a 321

<210> 12
<211> 107
<212> PRT

<213> Homo sapiens

<400> 12

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Arg
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 13

<211> 369

<212> DNA

<213> Homo sapiens

<400> 13

caggtgcagc tggggaggc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtgcag cctctggatt caccttcagt aactatggca tgcaactgggt ccggccaggct 120
ccaggcaagg ggctggagtg ggtgacaatt atatcatatg atggaaagtaa taaataactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagccttag agctgaggac acggctgtgt attactgtgt gacgttattac 300
gatttttggta gtggtttatct cccaggtatg gacgtctggg gccaaaggac cacggtcacc 360
gtctcctca 369

<210> 14

<211> 123

<212> PRT

<213> Homo sapiens

<400> 14

Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asn Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Thr Ile Ile Ser Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Val Thr Tyr Tyr Asp Phe Trp Ser Gly Tyr Leu Pro Gly Met Asp Val
100 105 110
Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

6

<210> 15

<211> 321

<212> DNA
<213> Homo sapiens

<400> 15
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atcacttgc gggcaagtca gggcattaga aatgatttaa cctggtatca gcagaaacca 120
gggaaaagccc ctaagcgcct gatctatgct gcatccagg tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt tcccggtggac gttcggccaa 300
gggaccaagg tggaaatcaa a 321

<210> 16
<211> 107
<212> PRT
<213> Homo sapiens

<400> 16
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Thr Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Phe Pro Trp
85 90 95
Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105

<210> 17
<211> 351
<212> DNA
<213> Homo sapiens

<400> 17
caggtgcagc tgcaggagtc gggcccagga ctggtaagc cttcgagac cctgtccctc 60
acctgcactg tctctgggg ctccatcaat cattactact ggagctggat ccggcagccc 120
gccgggaagg gcctggatg gattgggcgt atctatccca ctgggagcac caactacaac 180
ccctccctca agagtcgagt caccatgtca gtagacacgt ccaagaacca gttctccctg 240
aagctgagct ctgtgaccgc cgccgacacg gccgtatatt actgtgcggg cggctggtcg 300
tactggtaact tcgatctctg gggccgtggc accctggta ctgtccctc a 351

<210> 18
<211> 117
<212> PRT
<213> Homo sapiens

<400> 18
Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Glu
1 5 10 15
Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Asn His Tyr
20 25 30
Tyr Trp Ser Trp Ile Arg Gln Pro Ala Gly Lys Gly Leu Glu Trp Ile
35 40 45
Gly Arg Ile Tyr Pro Thr Gly Ser Thr Asn Tyr Asn Pro Ser Leu Lys

50	55	60	
Ser Arg Val Thr Met Ser Val Asp Thr Ser Lys Asn Gln Phe Ser Leu			
65	70	75	80
Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr Cys Ala			
85	90	95	
Gly Gly Trp Ser Tyr Trp Tyr Phe Asp Leu Trp Gly Arg Gly Thr Leu			
100	105	110	
Val Thr Val Ser Ser			
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<210> 19
<211> 342
<212> DNA
<213> Homo sapiens

<400> 19
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atctcctgca ggtctagtca aagcctcgta tacagtatg gaagcaccta cttgaattgg 120
tttcagcaga gcccaggcca atctccaagg cgcctaattt ataaggtttc taactgggac 180
tctgggtcc cagacagatt cagccgcagt gggtcaggca ctgatttcac actgaaaatc 240
agcaggggtgg aggctgaaga tgttgggtt tattactgca tgcaaggttc acactggcct 300
cgggagttca ctttcggcgg agggaccaag gtggagatca aa 342

<210> 20
<211> 114
<212> PRT
<213> Homo sapiens

<400> 20
Asp Val Val Met Thr Gln Ser Pro Leu Ser Leu Pro Val Thr Leu Gly
1 5 10 15
Gln Pro Ala Ser Ile Ser Cys Arg Ser Ser Gln Ser Leu Val Tyr Ser
20 25 30
Asp Gly Ser Thr Tyr Leu Asn Trp Phe Gln Gln Arg Pro Gly Gln Ser
35 40 45
Pro Arg Arg Leu Ile Tyr Lys Val Ser Asn Trp Asp Ser Gly Val Pro
50 55 60
Asp Arg Phe Ser Gly Ser Gly Ser Gly Thr Asp Phe Thr Leu Lys Ile
65 70 75 80
Ser Arg Val Glu Ala Glu Asp Val Gly Val Tyr Tyr Cys Met Gln Gly
85 90 95
Ser His Trp Pro Arg Glu Phe Thr Phe Gly Gly Gly Thr Lys Val Glu
100 105 110
Ile Lys

<210> 21
<211> 369
<212> DNA
<213> Homo sapiens

<400> 21
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tcctgtgcag cgtctggatt caccttcagt aactatgaca tgcactgggt ccgccaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggatg atgaaagtat taaataactat 180
gcagactccg tgaaggggccg attcaccatc tccagagaca attccaagaa cacgctgcat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagata 300

gcagtggctg gaggttacta ctacggttt gacgtctggg gccaaaggac cacggtcacc 360
gtctcctca 369

<210> 22
<211> 123
<212> PRT
<213> Homo sapiens

<400> 22
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asn Tyr
20 25 30
Asp Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Ile Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu His
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Ile Ala Val Ala Gly Gly Tyr Tyr Tyr Gly Leu Asp Val
100 105 110
Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

<210> 23
<211> 321
<212> DNA
<213> Homo sapiens

<400> 23
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atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggtac tgggacagaa ttcactctca cagtcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag catcatagtt acccgctcac tttcggcgg 300
gggaccaagg tacagatcaa t 321

<210> 24
<211> 107
<212> PRT
<213> Homo sapiens

<400> 24
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Val Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His His Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Gln Ile Asn

100

105

<210> 25
<211> 384
<212> DNA
<213> Homo sapiens

<400> 25
caggtgcagc tgcaggagtc gggcccagga ctggtaaagc cttcacagac cctgtccctc 60
acctgcactg tctctgggtt ctccatcagc agtgggtgtt actactggag ctggatccgc 120
cagcacccag ggaagggcct ggagtggatt gggAACATCT attacagtgg gagcacctac 180
tacacccgt ccctcaagag tcgagttacc atatcagtag acacgtctaa gaaccagttc 240
tccctgaagc tgagctctgt gactgccgac gacacggccg tgtattactg tgcgagagat 300
agtaaccaat ataactggaa cgacgaggc tacgactacg gtttggacgt ctggggccaa 360
gggaccacgg tcaccgtgtc ctca 384

<210> 26
<211> 128
<212> PRT
<213> Homo sapiens

<400> 26
Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Gln
1 5 10 15
Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Gly
20 25 30
Gly Tyr Tyr Trp Ser Trp Ile Arg Gln His Pro Gly Lys Gly Leu Glu
35 40 45
Trp Ile Gly Asn Ile Tyr Tyr Ser Gly Ser Thr Tyr Tyr Thr Pro Ser
50 55 60
Leu Lys Ser Arg Val Thr Ile Ser Val Asp Thr Ser Lys Asn Gln Phe
65 70 75 80
Ser Leu Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr
85 90 95
Cys Ala Arg Asp Ser Asn Gln Tyr Asn Trp Asn Asp Glu Val Tyr Asp
100 105 110
Tyr Gly Leu Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 27
<211> 321
<212> DNA
<213> Homo sapiens

<400> 27
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtccacc 60
atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggtac tgggacagaa ttcaactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataataatt accctctcac ttccggcgaa 300
gggaccaagg tggagatcaa a 321

<210> 28
<211> 107
<212> PRT
<213> Homo sapiens

<400> 28
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Asn Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 29
<211> 384
<212> DNA
<213> Homo sapiens

<400> 29
caggtgcagc tgcaggagtc gggcccagga ctgggtgaagc cttcacagac cctgtccctc 60
acctgcactg tctctgggtt ctccatcagc agtgggtggtt actactggag ctggatccgc 120
cagcacccag ggaagggcct ggagtggatt gggAACATCT attacagtgg gggcacctac 180
tacaacccgt ccctcaagag tcgagttacc atatcagtag acacgtctaa gaaccaggta 240
tccctgaagc tgagctctgt gactgcccgcg gacacggccg tggattactg tgcgagagat 300
agtaaccagt ataactggaa cgacgaggta tacgactacg gtttggacgt ctggggccaa 360
gggaccacgg tcaccgtctc ctca 384

<210> 30
<211> 128
<212> PRT
<213> Homo sapiens

<400> 30
Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Gln
1 5 10 15
Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Gly
20 25 30
Gly Tyr Tyr Trp Ser Trp Ile Arg Gln His Pro Gly Lys Gly Leu Glu
35 40 45
Trp Ile Gly Asn Ile Tyr Tyr Ser Gly Ser Thr Tyr Tyr Asn Pro Ser
50 55 60
Leu Lys Ser Arg Val Thr Ile Ser Val Asp Thr Ser Lys Asn Gln Phe
65 70 75 80
Ser Leu Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr
85 90 95
Cys Ala Arg Asp Ser Asn Gln Tyr Asn Trp Asn Asp Glu Val Tyr Asp
100 105 110
Tyr Gly Leu Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 31
<211> 321
<212> DNA
<213> Homo sapiens

<400> 31
gacatccaaa tgacccagtc tccatccgcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtgatc tggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtcttcag cataaaagtt accctctcac tttcggcgg 300
gggaccaagg tggagatcaa a 321

<210> 32
<211> 107
<212> PRT
<213> Homo sapiens

<400> 32
Asp Ile Gln Met Thr Gln Ser Pro Ser Ala Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Lys Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 33
<211> 366
<212> DNA
<213> Homo sapiens

<400> 33
caggtgcagc tggggaggt gtggccagc ctggggaggt cctgagactc 60
tcctgtgcag cctctggatt caccttcagt agctatggca tgcactgggt ccggcaggct 120
ccagccaagg ggctggagtg ggtggcagtt atatcatatg atgaaagtaa taaatactat 180
gcagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaatga acagcctgag agctgaggac acggctgtgt attactgtgc gagagatcag 300
gataactgga actactacta cggatggac gtctggggcc aaggaccac ggtcaccgtc 360
tcctca 366

<210> 34
<211> 122
<212> PRT
<213> Homo sapiens

<400> 34
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Ser Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60

Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Tyr
65					70					75				80	
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
						85			90				95		
Ala	Arg	Asp	Gln	Asp	Asn	Trp	Asn	Tyr	Tyr	Tyr	Gly	Met	Asp	Val	Trp
						100		105				110			
Gly	Gln	Gly	Thr	Thr	Val	Thr	Val	Ser	Ser						
						115		120							

<210> 35
 <211> 333
 <212> DNA
 <213> Homo sapiens

<400> 35
 gatattgtga tgactcagtc tccactctcc ctgcccgtca cccctggaga gccggccctcc 60
 atctcctgca ggtctagtca gagcctcctt catacataatg gatacacaacta tttggattgg 120
 tacctgcaga agccagggca gtctccacag ctcctgatct ttttgggttc ttatcgggcc 180
 tccggggtcc ctgacaggtt cagttggcagt ggatcaggca cagattttac actgaaaatc 240
 agcagagtgg aggctgagga tgttgggtt tattactgca tgcaagctct acaaacttgg 300
 acgttcggcc aagggaccaa ggtggaaatc aaa 333

<210> 36
 <211> 111
 <212> PRT
 <213> Homo sapiens

<400> 36
 Asp Ile Val Met Thr Gln Ser Pro Leu Ser Leu Pro Val Thr Pro Gly
 1 5 10 15
 Glu Pro Ala Ser Ile Ser Cys Arg Ser Ser Gln Ser Leu Leu His Ser
 20 25 30
 Asn Gly Tyr Asn Tyr Leu Asp Trp Tyr Leu Gln Lys Pro Gly Gln Ser
 35 40 45
 Pro Gln Leu Leu Ile Phe Leu Gly Ser Tyr Arg Ala Ser Gly Val Pro
 50 55 60
 Asp Arg Phe Ser Gly Ser Gly Ser Gly Thr Asp Phe Thr Leu Lys Ile
 65 70 75 80
 Ser Arg Val Glu Ala Glu Asp Val Gly Val Tyr Tyr Cys Met Gln Ala
 85 90 95
 Leu Gln Thr Trp Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
 100 105 110

<210> 37
 <211> 372
 <212> DNA
 <213> Homo sapiens

<400> 37
 caggtgcagc tggggaggc gtgggtccagc ctggggaggc cctgagactc 60
 tcctgtgcag cgtctggatt caccttcagt aactatgaca tgcactgggt cccgcaggct 120
 ccaggcaagg ggctggagtg ggtggcagtt atatggatg atggaaagtat taaataactat 180
 gcagactccg tgaaggggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
 ctgcaaatga acagcctgag agccgaggac acggctgtgt atttctgtgc gagagagaca 300
 gctatccta ggggctacta ctactacgt atggacgtct ggggccaagg gaccacggtc 360
 accgtctcct ca 372

<210> 38
<211> 124
<212> PRT
<213> Homo sapiens

<400> 38
.Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asn Tyr
20 25 30
Asp Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Ile Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Phe Cys
85 90 95
Ala Arg Glu Thr Ala Ile Leu Arg Gly Tyr Tyr Tyr Tyr Asp Met Asp
100 105 110
Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

<210> 39
<211> 321
<212> DNA
<213> Homo sapiens

<400> 39
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgtaggaga cagagtcacc 60
atcaattgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctctgct gcatccagtt tgcaaggtgg ggtcccatca 180
aggttcagcg gcagtgatc tggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt accctctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 40
<211> 107
<212> PRT
<213> Homo sapiens

<400> 40
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Ser Ala Ala Ser Ser Leu Gln Gly Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 41
<211> 372
<212> DNA
<213> Homo sapiens

<400> 41
caggtgcagt tggggaggc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtgcag cctctggatt cacctcagt agctatgaca tgcactgggt ccggccaggct 120
ccagggcaagg ggctggaggc ggtggcagtt atatcatatg atggaaagtat taaatactat 180
gcagactccg tgaaggggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaagtga acagcctgag agctgaggac acggctgtt attactgtgc gagagaggtc 300
cgttagtggga gctactacta ttactacagt atggacgtct ggggccaagg gaccacggtc 360
accgtctcctt ca 372

<210> 42
<211> 124
<212> PRT
<213> Homo sapiens

<400> 42
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Asp Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Ser Tyr Asp Gly Ser Ile Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Val Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Val Arg Ser Gly Ser Tyr Tyr Tyr Tyr Ser Met Asp
100 105 110
Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

<210> 43
<211> 321
<212> DNA
<213> Homo sapiens

<400> 43
gacatccaga tgacccagtc tccatccctcc ctgtctgcat ctgtaggaga cagagtccacc 60
atcacttgcc gggcaagtca ggacatcaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcgtccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc tggccagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacaa cataatagtt atccgctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 44
<211> 107
<212> PRT
<213> Homo sapiens

<400> 44
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15

Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Asp Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Pro Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 45
<211> 345
<212> DNA
<213> Homo sapiens

<400> 45
gagggtgcagc tgggtggagtc tggaggaggc ttgatccagc ctggggggtc cctgagactc 60
tcctgtgcag cctctgggtt caccgtcagt agcaactaca tgagctgggt ccggccaggct 120
ccagggaaagg ggcttggaaatg ggtctcagtt atttatacgct gtgataggac atactacgca 180
gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctgtatctt 240
caaataaaca gcctgagagc cgaggacacg gccgtgtatt actgtgcgcg aggggagggg 300
ggatttgact actggggcca gggaaaccctg gtcaccgtct cctca 345

<210> 46
<211> 115
<212> PRT
<213> Homo sapiens

<400> 46
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Asp Arg Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Gly Glu Gly Gly Phe Asp Tyr Trp Gly Gln Gly Thr Leu Val Thr
100 105 110
Val Ser Ser
115

<210> 47
<211> 318
<212> DNA
<213> Homo sapiens

<400> 47
gaaatagtga tgacgcagtc tccagccacc ctgtctgtt ctccagggga aagagccacc 60
ctctcctgca gggccagtca gagtgttacc agcaacttag cctggatcca gcagaaacct 120

ggccaggcgc ccagactcct catccatggt gcatccatta gggccactgg tctcccagcc 180
aggttcagtgc cagtggttc tggacagag ttcactctca ccatcagtag cctgcagtct 240
gaagattttc cagtcttata ctgtcagcag tataattttt ggtggacgtt cggccaagg 300
accaagggtgg aatcaaa 318

<210> 48
<211> 106
<212> PRT
<213> Homo sapiens

<400> 48
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Thr Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
His Gly Ala Ser Ile Arg Ala Thr Gly Leu Pro Ala Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Tyr Trp Trp Thr
85 90 95
Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105

<210> 49
<211> 345
<212> DNA
<213> Homo sapiens

<400> 49
gaggtgcagc tgggggggtc tggaggaggc ttgatccagc ctggggggtc cctgagactc 60
tcctgtgcag cctctgggtt caccgtcagt aggaactaca tgagctgggt ccggcaggct 120
ccagggaaagg ggcttggatg ggttcagtt atttatacgcg gtataggac atactacgca 180
gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctgtatctt 240
caaataaca gcctgagagc cgaggacacg gccgtgtatt actgtgcgcg aggggagg 300
ggatttgact actggggcca gggaccctg gtcaccgtct cctca 345

<210> 50
<211> 115
<212> PRT
<213> Homo sapiens

<400> 50
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Arg Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Asp Arg Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Gly Glu Gly Gly Phe Asp Tyr Trp Gly Gln Gly Thr Leu Val Thr

100
Val Ser Ser
115

105

110

<210> 51
<211> 318
<212> DNA
<213> Homo sapiens

<400> 51
gaaaatgtga tgacgcagtc tccagccacc ctgtctgtgt ctccagggga aagagccacc 60
ctctctgca gggccagtca gagtgttagc agcaacttag cctggtagca gcagaaacct 120
ggccaggctc ccagactcct catccatggt gcatccatta gggccactgg tctccagcc 180
aggttcagtg gcagtgggtc tgggacagag ttcactctca ccattcagtag cctccagtct 240
gaagattttg cagtcttatta ctgtcagcag tataatttattt ggtggacgtt cggccaagg 300
accaaggtgg aatcaaa 318

<210> 52
<211> 106
<212> PRT
<213> Homo sapiens

<400> 52
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ser Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
His Gly Ala Ser Ile Arg Ala Thr Gly Leu Pro Ala Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Tyr Trp Trp Thr
85 90 95
Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105

<210> 53
<211> 345
<212> DNA
<213> Homo sapiens

<400> 53
gaggtgcagc tgggtggagtc tggaggaggc ttgatccagc ctggggggtc cctgagactc 60
tcctgtgcag cctctgagtt caccgtcagt aggaactaca tgagctgggt ccggcaggct 120
ccagggaaagg gactggaaatg ggtctcagtt attatagcg gtgataggac atactacgca 180
gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctgtatctt 240
caaataaca gcctgagagc cgaggacacg gccgtgtatt actgtgcgcg aggggagggg 300
ggatttgact actggggcca gggaaacctg gtcaccgtct cctca 345

<210> 54
<211> 115
<212> PRT
<213> Homo sapiens

<400> 54

Glu Val Gln Leu Val Glu Ser Gly Gly Gly Leu Ile Gln Pro Gly Gly
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Glu Phe Thr Val Ser Arg Asn
 20 25 30
 Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ser Val Ile Tyr Ser Gly Asp Arg Thr Tyr Tyr Ala Asp Ser Val Lys
 50 55 60
 Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
 65 70 75 80
 Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
 85 90 95
 Arg Gly Glu Gly Gly Phe Asp Tyr Trp Gly Gln Gly Thr Leu Val Thr
 100 105 110
 Val Ser Ser
 115

<210> 55
 <211> 318
 <212> DNA
 <213> Homo sapiens

<400> 55
 gaaaatagtga tgacgcagtc tccagccacc ctgtctgtgt ctccagggga aagagccacc 60
 ctctcctgca gggccagtca gagtgttagc agcaacttag cctggtagca gcagaaaacct 120
 ggcaggcgtc ccagactcct catccatggt gcatccatta gggccactgg tctcccgagcc 180
 aggttcagtg gcagtgggtc tgggacagag ttcactctca ccatcagtag cctgcagtc 240
 gaagattttg cagtcttatta ctgtcagcag tataattttt ggtggacgtt cggccaagg 300
 accaagggtgg aatcaaa 318

<210> 56
 <211> 106
 <212> PRT
 <213> Homo sapiens

<400> 56
 Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
 1 5 10 15
 Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ser Ser Asn
 20 25 30
 Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
 35 40 45
 His Gly Ala Ser Ile Arg Ala Thr Gly Leu Pro Ala Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser
 65 70 75 80
 Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Tyr Trp Trp Thr
 85 90 95
 Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
 100 105

<210> 57
 <211> 375
 <212> DNA
 <213> Homo sapiens

<400> 57

caggtgcaac tgggggagtc tgggggagtc gtggccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccgtcagt agctatggca tgcaactgggt ccggccaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggtcta atggaaagttaa taagtactat 180
gcagactccg tgaaggggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagataac 300
ggtgtctacg tgggatacgc ctactattac ggtatggacg tctgggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 58
<211> 125
<212> PRT
<213> Homo sapiens

<400> 58
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Ser Asn Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Asp Asn Gly Val Tyr Val Gly Tyr Ala Tyr Tyr Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 59
<211> 321
<212> DNA
<213> Homo sapiens

<400> 59
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgtaggaga cagagtcacc 60
atcacattgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcaagtggatc tgggacagaa ttcaactctca caatcagcag cctgcagcct 240
gaagattttg caacttattta ctgtctacag cataatagtt accctcggac gttcggccaa 300
gggaccaagg tggaaatcaa a 321

<210> 60
<211> 107
<212> PRT
<213> Homo sapiens

<400> 60
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60

Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Arg
85 90 95
Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105

<210> 61
<211> 375
<212> DNA
<213> Homo sapiens

<400> 61
caggtgcaac tgggtggagtc tgggggaggc gtggtccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccgtcagt agctatggca tgcaactgggt ccgcccaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggtcta atggaaagtaa taagtactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagataac 300
ggtgtctacg tgggatacgc ctactattac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 62
<211> 125
<212> PRT
<213> Homo sapiens

<400> 62
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Ser Asn Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Asp Asn Gly Val Tyr Val Gly Tyr Ala Tyr Tyr Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 63
<211> 321
<212> DNA
<213> Homo sapiens

<400> 63
gacatccaga tgacccagtc tccatccctcc ctgtctgcat ctgtaggaga cagagtccacc 60
atcacttgcc gggcaagtc gggcattaga aatgatttag gctggtatca gcaaaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcacagtg ggtcccatca 180
aggttcagcg gcagtggtac tgggacagaa ttcaactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacaa cataatagtt acccgtggac gttcggccaa 300
gggaccaagg tggaaatcaa a 321

<210> 64
<211> 107
<212> PRT
<213> Homo sapiens

<400> 64
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu His Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Trp
85 90 95
Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105

<210> 65
<211> 384
<212> DNA
<213> Homo sapiens

<400> 65
caggtgcagc tgggtggagtc tgggggaagc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagt aactatggca tacactgggt ccggccaggct 120
ccagggcaagg ggctggagtg ggtggcagtt atatggtctg atggaaagtaa taaatactat 180
gcagactccg tgaaggggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagccttag agccgaggac acggctgtgt attactgtgc gagagagctc 300
ccgaataatgtg ggagctactc cggttactac tactactacg gtatggacgt ctggggccaa 360
gggaccacgg tcaccgtctc ctca 384

<210> 66
<211> 128
<212> PRT
<213> Homo sapiens

<400> 66
Gln Val Gln Leu Val Glu Ser Gly Gly Ser Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asn Tyr
20 25 30
Gly Ile His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Ser Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Leu Pro Asn Ser Gly Ser Tyr Ser Gly Tyr Tyr Tyr Tyr
100 105 110
Tyr Gly Met Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 67
<211> 321
<212> DNA
<213> Homo sapiens

<400> 67
gacatccaga tgacccagtc tccatccctcc ctgtctgcat ctgttaggaga cagagtccacc 60
atcacttgc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggtac tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cattgttgtt accctctcac tttcggcgg 300
gggaccaagg tggaaatcaa a 321

<210> 68
<211> 107
<212> PRT
<213> Homo sapiens

<400> 68
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Cys Cys Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 69
<211> 375
<212> DNA
<213> Homo sapiens

<400> 69
caggtgcagc tgggtggagtc tgggggaggc gtggtccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcgt agctatgaca tgcactgggt ccggcaggct 120
ccagccaagg ggctggagtg ggtggcagtt atatggctg atggaaagtat taaatactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagccttag agccgaggac acggctgtgt attactgtgc gagagaagtg 300
gaatcagcta tgggaggggtt ctactacaac ggtatggacg tctgggcca aggggcccacg 360
gtcaccgtct cctca 375

<210> 70
<211> 125
<212> PRT
<213> Homo sapiens

<400> 70
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr

20	25	30	
Asp Met His Trp Val Arg Gln Ala Pro Gly Lys Gly	Leu Glu Trp Val		
35	40	45	
Ala Val Ile Trp Ser Asp Gly Ser Ile Lys Tyr Tyr	Ala Asp Ser Val		
50	55	60	
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr	Leu Tyr		
65	70	75	80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr	Tyr Cys		
85	90	95	
Ala Arg Glu Val Glu Ser Ala Met Gly Gly Phe Tyr Tyr	Asn Gly Met		
100	105	110	
Asp Val Trp Gly Gln Gly Ala Thr Val Thr Val Ser Ser			
115	120	125	

<210> 71
<211> 321
<212> DNA
<213> Homo sapiens

<400> 71
gacatccaga tgacccagtc tccatccctcc ctgtctgcat ctgttagggga cagagtcacc 60
atcacttgcc gggcaagtca gggcattaga attgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccactt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggtac ggggacagaa ttcattttca caatcagcag cctgcagcct 240
gaagattttg caagttatta ctgtctacag cataaaagtt accctctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 72
<211> 107
<212> PRT
<213> Homo sapiens

<400> 72
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Ile Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Thr Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Ile Phe Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Ser Tyr Tyr Cys Leu Gln His Lys Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 73
<211> 375
<212> DNA
<213> Homo sapiens

<400> 73
caggtgcagc tggtgagtc tggggaggc gtggtccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagt agctatgaca tgcactgggt ccgccaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggctg atgaaagtat taaatactat 180

gcagactccg tgaaggccc attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagaagtg 300
gaatcagcta tgggagggtt ctactacaac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 74
<211> 125
<212> PRT
<213> Homo sapiens

<400> 74
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Asp Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Ser Asp Gly Ser Ile Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Val Glu Ser Ala Met Gly Gly Phe Tyr Tyr Asn Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 75
<211> 375
<212> DNA
<213> Homo sapiens

<400> 75
caggtgcagc tggtgagtc tggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt cacctcagt aaccatgaca tacactgggt ccgccaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggctg atgaaagtaa taaatactat 180
gcagactccg tgaaggccc attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagaag 300
atggctacaa ttaagggtt ctactactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 76
<211> 125
<212> PRT
<213> Homo sapiens

<400> 76
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asn His
20 25 30
Asp Ile His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Ser Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80

Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Lys Met Ala Thr Ile Lys Gly Tyr Tyr Tyr Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 77
<211> 321
<212> DNA
<213> Homo sapiens

<400> 77
gacatccaga tgacccagtc tccatccctcc ctgtctgcat ctgtaggaga cagagtccacc 60
atcaattgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tggaaaagtgg ggtcccatca 180
aggttcagcg gcagtggtatc tggccagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgga 300
gggaccaagg tggagatcca a 321

<210> 78
<211> 107
<212> PRT
<213> Homo sapiens

<400> 78
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Glu Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Pro Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Gln
100 105

<210> 79
<211> 336
<212> DNA
<213> Oryctolagus cuniculus

<400> 79
cagtcactgg aggagtccgg gggtcgcctg gtcacgcctg ggacacccct gacactcacc 60
tgcacagtct ctggaatcga cctcaatgc aatacaatgg gctggttccg ccgggctcca 120
ggaaaggggc tggagtggat cggaatcatt attagtagtg gtaccacata ctacgcgagc 180
tgggtaaaag gccgattcac catctccaaa acctcgacca cggtgatct gaaaatcacc 240
cgtccgacaa ccgaggacac ggccacatat ttctgtgcca gaggtggta cgagtttaac 300
ttgtggggcc caggcaccct ggtcaccgtc tcctca 336

<210> 80
<211> 112
<212> PRT

<213> Oryctolagus cuniculus

<400> 80

Gln Ser Leu Glu Glu Ser Gly Gly Arg Leu Val Thr Pro Gly Thr Pro
1 5 10 15
Leu Thr Leu Thr Cys Thr Val Ser Gly Ile Asp Leu Ser Ser Asn Thr
20 25 30
Met Gly Trp Phe Arg Arg Ala Pro Gly Lys Gly Leu Glu Trp Ile Gly
35 40 45
Ile Ile Ile Ser Ser Gly Thr Thr Tyr Tyr Ala Ser Trp Val Lys Gly
50 55 60
Arg Phe Thr Ile Ser Lys Thr Ser Thr Thr Val Asp Leu Lys Ile Thr
65 70 75 80
Arg Pro Thr Thr Glu Asp Thr Ala Thr Tyr Phe Cys Ala Arg Gly Trp
85 90 95
Tyr Glu Phe Asn Leu Trp Gly Pro Gly Thr Leu Val Thr Val Ser Ser
100 105 110

<210> 81

<211> 339

<212> DNA

<213> Oryctolagus cuniculus

<400> 81

gatgttgtga tgacccagac tccagcctcc gtggaggcag ctgtggagg cacagtacc 60
atcaagtgcc aggccagtga gaacattgat atcttattgg cctggtatca gcagaaagta 120
gggcagcctc ccaagctct gatctatagg gcatccaaac tggcctctgg ggccccatcg 180
cggttcagcg gcagtggatc tgggacagag ttcactctca ccatcagcga cctggagtg 240
ggcgatgctg ccacttacta ctgtcaaagc aatgttgta gtactgctag aagttagttat 300
ggtaatgctt tcggcggagg gaccgaggtg gtggtaaaa 339

<210> 82

<211> 113

<212> PRT

<213> Oryctolagus cuniculus

<400> 82

Asp Val Val Met Thr Gln Thr Pro Ala Ser Val Glu Ala Ala Val Gly
1 5 10 15
Gly Thr Val Thr Ile Lys Cys Gln Ala Ser Glu Asn Ile Asp Ile Leu
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Val Gly Gln Pro Pro Lys Leu Leu Ile
35 40 45
Tyr Arg Ala Ser Lys Leu Ala Ser Gly Ala Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Asp Leu Glu Cys
65 70 75 80
Gly Asp Ala Ala Thr Tyr Tyr Cys Gln Ser Asn Val Gly Ser Thr Ala
85 90 95
Arg Ser Ser Tyr Gly Asn Ala Phe Gly Gly Gly Thr Glu Val Val Val
100 105 110
Lys

<210> 83

<211> 348

<212> DNA

<213> Homo sapiens

<400> 83

caggtgcagc tggggagtc tggggaggc ttggtaagc ctggagggtc cctgagactc 60
tcctgtgcag cctctggatt cacccatg gactactaca tgagctggat ccggccaggct 120
ccagggaaagg ggctggagtg ggtttcatac attagtagaa gtggtagtac cataatactac 180
gcagactctg tgaaggggccg attcaccatc tccagggaca acgccaagaa ctcaactgtat 240
ctgcaatga acagcctgag agccgaggac acggccgtgt attactgtgc gagatcttta 300
ggcggtatgg acgtctgggg ccaagggacc acggtcaccg tctcctca 348

<210> 84

<211> 116

<212> PRT

<213> Homo sapiens

<400> 84

Gln Val Gln Leu Val Glu Ser Gly Gly Gly Leu Val Lys Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asp Tyr
20 25 30
Tyr Met Ser Trp Ile Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Tyr Ile Ser Arg Ser Gly Ser Thr Ile Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn Ser Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Ser Leu Gly Gly Met Asp Val Trp Gly Gln Gly Thr Thr Val
100 105 110
Thr Val Ser Ser
115

<210> 85

<211> 330

<212> DNA

<213> Homo sapiens

<400> 85

cagtctgtgt tgacgcagcc gccctcagtg tctgcggccc caggacagaa ggtcaccatc 60
tcctgtctg gaagcagctc caacattggg aataattatg tattctggta ccagcagttc 120
ccaggaacag ccccaaaact cctcatttat gacaataata gccgaccctc agggattcct 180
gaccgattct ctggctccaa gtctggcacg tcagccaccc tgggcatcac cgactccag 240
actggggacg aggccgatta ttactgcgga acatggata gcagcctgag tgctgggtg 300
ttcggcggag ggaccaagct gaccgtccta 330

<210> 86

<211> 110

<212> PRT

<213> Homo sapiens

<400> 86

Gln Ser Val Leu Thr Gln Pro Pro Ser Val Ser Ala Ala Pro Gly Gln
1 5 10 15
Lys Val Thr Ile Ser Cys Ser Gly Ser Ser Ser Asn Ile Gly Asn Asn
20 25 30
Tyr Val Ser Trp Tyr Gln Gln Phe Pro Gly Thr Ala Pro Lys Leu Leu
35 40 45

Ile	Tyr	Asp	Asn	Asn	Ser	Arg	Pro	Ser	Gly	Ile	Pro	Asp	Arg	Phe	Ser
50										55				60	
Gly	Ser	Lys	Ser	Gly	Thr	Ser	Ala	Thr	Leu	Gly	Ile	Thr	Gly	Leu	Gln
65										70				75	
Thr	Gly	Asp	Glu	Ala	Asp	Tyr	Tyr	Cys	Gly	Thr	Trp	Asp	Ser	Ser	Leu
										85				90	
Ser	Ala	Gly	Val	Phe	Gly	Gly	Thr	Lys	Leu	Thr	Val	Leu			95
										100				105	
														110	

<210> 87

<211> 354

<212> DNA

<213> Homo sapiens

<400> 87

caggtgcagc	tggtgagtc	tggggagac	gtggtccagc	ctgggaggtc	cctgagactc	60
tcctgtgcag	cgtctggatt	caccttcagt	agctctggca	tgcactgggt	ccgcccaggct	120
ccaggcaagg	ggctggagtg	ggtggcaatt	atatggtatg	atggaagtaa	taaataactat	180
gcagactccg	tgaagggccc	attcaccatc	tccagagaca	attccaagaa	cacgctgtat	240
ctgcaaatga	acagccttag	agccgaggac	acggctgtgt	attactgtgc	gagagatgac	300
tactactacg	gtatggacgt	ctggggccaa	gggaccacgg	tcaccgtctc	ctca	354

<210> 88

<211> 118

<212> PRT

<213> Homo sapiens

<400> 88

Gln	Val	Gln	Leu	Val	Glu	Ser	Gly	Gly	Asp	Val	Val	Gln	Pro	Gly	Arg
1										5		10		15	
Ser	Leu	Arg	Leu	Ser	Cys	Ala	Ala	Ser	Gly	Phe	Thr	Phe	Ser	Ser	Ser
										20		25		30	
Gly	Met	His	Trp	Val	Arg	Gln	Ala	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val
										35		40		45	
Ala	Ile	Ile	Trp	Tyr	Asp	Gly	Ser	Asn	Lys	Tyr	Tyr	Ala	Asp	Ser	Val
										50		55		60	
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Tyr
										65		70		75	
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
										85		90		95	
Ala	Arg	Asp	Asp	Tyr	Tyr	Tyr	Gly	Met	Asp	Val	Trp	Gly	Gln	Gly	Thr
										100		105		110	
Thr	Val	Thr	Val	Ser	Ser										
										115					

<210> 89

<211> 330

<212> DNA

<213> Homo sapiens

<400> 89

cagtctgcgt	tgacgcagcc	gccctcagtg	tctgcggccc	caggacagaa	ggtcaccatc	60
tcctgtctg	gaagcagctc	caacattggg	agtaattatg	tatcctggtg	ccagcagctc	120
ccaagaacag	cccccaaact	cctcatttat	gacaataata	agcgaccctc	agggattcct	180
gaccgattct	ctggctccaa	gtctggcacg	tcagccaccc	tggtcatcac	cggactccag	240
actggggacg	aggccgatta	ttactgcgga	gcatggata	gcagcctgag	tgctgggtta	300
ttcggcgag	ggaccaagct	gaccgtctca				330

<210> 90
<211> 110
<212> PRT
<213> Homo sapiens

<400> 90
Gln Ser Ala Leu Thr Gln Pro Pro Ser Val Ser Ala Ala Pro Gly Gln
1 5 10 15
Lys Val Thr Ile Ser Cys Ser Gly Ser Ser Ser Asn Ile Gly Ser Asn
20 25 30
Tyr Val Ser Trp Cys Gln Gln Leu Pro Arg Thr Ala Pro Lys Leu Leu
35 40 45
Ile Tyr Asp Asn Asn Lys Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser
50 55 60
Gly Ser Lys Ser Gly Thr Ser Ala Thr Leu Val Ile Thr Gly Leu Gln
65 70 75 80
Thr Gly Asp Glu Ala Asp Tyr Tyr Cys Gly Ala Trp Asp Ser Ser Leu
85 90 95
Ser Ala Gly Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 91
<211> 363
<212> DNA
<213> Homo sapiens

<400> 91
caggtgcagc tggtgagtc tgggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagt agctatggca tgcactgggt ccggcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggatgt atggaaataa taaatactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctatat 240
ctgcaaatga acagccttag agccgaggac acggctgtgt attactgtgc gagagagagc 300
gactacggtg gtaaccctta cttgactac tggggccaag ggaccctggc caccgtctcc 360
tca 363

<210> 92
<211> 121
<212> PRT
<213> Homo sapiens

<400> 92
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Asn Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Ser Asp Tyr Gly Gly Asn Pro Tyr Phe Asp Tyr Trp Gly
100 105 110
Gln Gly Thr Leu Val Thr Val Ser Ser
115 120

<210> 93
<211> 324
<212> DNA
<213> Homo sapiens

<400> 93
tcttctgagc tgactcagga ccctgctgtg tctgtggct tgggacagac agtcaggatc 60
acatgccaag gagacagcct cagaagctat tatgcaagct ggtaccagca gaggccagga 120
caggcccctg tacttgtcat ctatggtaga aacaaccggc cctcaggat cccagaccga 180
ttctctggct ccagctcagg actcacagct tccttgaccg tcactgggc tcaggcggaa 240
gatgagggctg actattactg taactcccg gacagcagtt ataaccatgt ggcattcggc 300
ggagggacca agctgaccgt ccta 324

<210> 94
<211> 108
<212> PRT
<213> Homo sapiens

<400> 94
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Ser Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Arg Pro Gly Gln Ala Pro Val Leu Val Ile Tyr
35 40 45
Gly Arg Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Leu Thr Ala Ser Leu Thr Val Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Asn Ser Arg Asp Ser Ser Tyr Asn His
85 90 95
Val Ala Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 95
<211> 363
<212> DNA
<213> Homo sapiens

<400> 95
caggtgcagc tggggaggc gtggccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt cacccctcgt agctatggca tgaactgggt cccgcaggct 120
ccagccaagg ggctggaggc ggtggcagtt atatggatg atggaaagttaa taaataactat 180
ggagactccg tgaaggcccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
gtgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagagc 300
gactacggtg gtaaccctta ctttgactac tggggccagg gaaccctggc caccgtctcc 360
tca 363

<210> 96
<211> 121
<212> PRT
<213> Homo sapiens

<400> 96
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15

Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
 20 25 30
 Gly Met Asn Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Gly Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
 65 70 75 80
 Val Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Arg Glu Ser Asp Tyr Gly Gly Asn Pro Tyr Phe Asp Tyr Trp Gly
 100 105 110
 Gln Gly Thr Leu Val Thr Val Ser Ser
 115 120

<210> 97

<211> 324

<212> DNA

<213> Homo sapiens

<400> 97

tcttctgagc tgactcagga ccctgctgtg tctgtggcct tgggacagac agtcaggatc 60
 acatgccaag gagacagccct cagaatctat tatgcaagct ggtaccagca gaagccagga 120
 caggccctgt tacttgtcat ctatggtaaa aacaaccggc cctcaggatcccagaccga 180
 ttctctggct ccagctcagg aaacacagct tccttgaccg tcactggggc tcaggcggaa 240
 gatgagggctg actattactg taagtcccg gacagcagtt ttaaccatgt gacattcggc 300
 ggagggacca agctgaccgt ccta 324

<210> 98

<211> 108

<212> PRT

<213> Homo sapiens

<400> 98

Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
 1 5 10 15
 Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Ile Tyr Tyr Ala
 20 25 30
 Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Val Leu Val Ile Tyr
 35 40 45
 Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
 50 55 60
 Ser Ser Gly Asn Thr Ala Ser Leu Thr Val Thr Gly Ala Gln Ala Glu
 65 70 75 80
 Asp Glu Ala Asp Tyr Tyr Cys Lys Ser Arg Asp Ser Ser Phe Asn His
 85 90 95
 Val Thr Phe Gly Gly Thr Lys Leu Thr Val Leu
 100 105

<210> 99

<211> 348

<212> DNA

<213> Homo sapiens

<400> 99

gaggtgcagc tggcagtc tggagcagag gtgaaaaagc ccggggagtc tctgaagatc 60
 tcctgttaagg gttctggata cagcttacc agtgactgga tcggctgggt gcgccagatg 120

cccgaaaaag gcctggagtg gatggggatc atctatcctg gtgactctga taccagatac 180
agcccgctct tccaaggcca ggtcaccatc tcagccgaca agtccatcac caccgcctac 240
ctgcagtgaa gcagcctgaa ggcctcgac accgcatgt attactgtgc gaggagtgg 300
tacggatgg acgtctgggg ccaagggacc acggtcaccc tctcctca 348

<210> 100
<211> 116
<212> PRT
<213> Homo sapiens

<400> 100
Glu Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Glu
1 5 10 15
Ser Leu Lys Ile Ser Cys Lys Gly Ser Gly Tyr Ser Phe Thr Ser Asp
20 25 30
Trp Ile Gly Trp Val Arg Gln Met Pro Gly Lys Gly Leu Glu Trp Met
35 40 45
Gly Ile Ile Tyr Pro Gly Asp Ser Asp Thr Arg Tyr Ser Pro Ser Phe
50 55 60
Gln Gly Gln Val Thr Ile Ser Ala Asp Lys Ser Ile Thr Thr Ala Tyr
65 70 75 80
Leu Gln Trp Ser Ser Leu Lys Ala Ser Asp Thr Ala Met Tyr Tyr Cys
85 90 95
Ala Arg Ser Gly Tyr Gly Met Asp Val Trp Gly Gln Gly Thr Thr Val
100 105 110
Thr Val Ser Ser
115

<210> 101
<211> 334
<212> DNA
<213> Homo sapiens

<400> 101
cagtctctgc tgacgcagcc gccctcagtg tctggggccc cagggcagag ggtcaccatc 60
tcctgcactg ggagcagctc caacatcggg gcaggttatg atgtacactg gtaccagcag 120
tttccaggaa cagcccccaa actcctcatc tatgtaaca gcaatcggcc ctcaggggtc 180
cctgaccgat tctctggctc caagtctggc acctcagcct ccctggccat cactgggtc 240
caggctgagg atgaggctga ttattactgc cagtcctatg acagcagcct gagtggttcg 300
gtattcggcg gaggaccaa gctgaccgtc ctag 334

<210> 102
<211> 111
<212> PRT
<213> Homo sapiens

<400> 102
Gln Ser Leu Leu Thr Gln Pro Pro Ser Val Ser Gly Ala Pro Gly Gln
1 5 10 15
Arg Val Thr Ile Ser Cys Thr Gly Ser Ser Ser Asn Ile Gly Ala Gly
20 25 30
Tyr Asp Val His Trp Tyr Gln Gln Phe Pro Gly Thr Ala Pro Lys Leu
35 40 45
Leu Ile Tyr Gly Asn Ser Asn Arg Pro Ser Gly Val Pro Asp Arg Phe
50 55 60
Ser Gly Ser Lys Ser Gly Thr Ser Ala Ser Leu Ala Ile Thr Gly Leu
65 70 75 80
Gln Ala Glu Asp Glu Ala Asp Tyr Tyr Cys Gln Ser Tyr Asp Ser Ser

85 90 95
Leu Ser Gly Ser Val Phe Gly Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 103
<211> 375
<212> DNA
<213> Homo sapiens

<400> 103
cagggtgcagc tgggtggagtc tgggggaggc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtgcag cgtctggatt taccttcagt agttatgaca tgcactgggt ccggccaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggtatg atggaaagtaa taaataccat 180
gcagactccg tgaaggggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagccttag agccgaggac acggctgtgt attactgtgc gagagagaat 300
actatggttc gggggggggg ctactactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 104
<211> 125
<212> PRT
<213> Homo sapiens

<400> 104
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Asp Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr His Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Asn Thr Met Val Arg Gly Gly Asp Tyr Tyr Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 105
<211> 324
<212> DNA
<213> Homo sapiens

<400> 105
tcttctgagc tgactcagga ccctgctgtg tctgtggcct tgggacagac agtcaggatc 60
acatgccaag gagacagcct cagaaggat tatgcaagct ggtaccagca gaagccagga 120
caggccccta tacttgtcat ctatggtaaa aacaaccggc cctcaggatcccagaccga 180
ttctctggct ccagctcagg aaacacagct tccttgcacca tcactgggc tcaggcggaa 240
gatgaggctg actattactg taactcccgg gacagcagt gtaaccatct ggtgttcggc 300
ggagggacca agctgaccgt ccta 324

<210> 106
<211> 108
<212> PRT

<213> Homo sapiens

<400> 106

Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Arg Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Ile Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Asn Ser Arg Asp Ser Ser Gly Asn His
85 90 95
Leu Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 107

<211> 366

<212> DNA

<213> Homo sapiens

<400> 107

caggttcagc tggtcagtc tggagctgag gtgaagaagc ctggggcctc agtgaaggtc 60
tcctgcaagg cttctggta caccttacc agctatgta tcagctgggt gcgacaggcc 120
cctggacaag ggcttgagtg gatgggatgg atcagcgctt acaatgttaa cacaaactat 180
gcacagaagc tccagggcag agtcaccatg accacagaca catccacgaa cacagctac 240
atggaaactga ggagcctgag atctgacgac acggccgtgt attactgtgc gagagatcct 300
ataactgaaa ctatggagga ctactttgac tactggggcc agggAACCTT ggtcaccgtc 360
tcctca 366

<210> 108

<211> 122

<212> PRT

<213> Homo sapiens

<400> 108

Gln Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Ala
1 5 10 15
Ser Val Lys Val Ser Cys Lys Ala Ser Gly Tyr Thr Phe Thr Ser Tyr
20 25 30
Gly Ile Ser Trp Val Arg Gln Ala Pro Gly Gln Gly Leu Glu Trp Met
35 40 45
Gly Trp Ile Ser Ala Tyr Asn Val Asn Thr Asn Tyr Ala Gln Lys Leu
50 55 60
Gln Gly Arg Val Thr Met Thr Thr Asp Thr Ser Thr Asn Thr Ala Tyr
65 70 75 80
Met Glu Leu Arg Ser Leu Arg Ser Asp Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Asp Pro Ile Thr Glu Thr Met Glu Asp Tyr Phe Asp Tyr Trp
100 105 110
Gly Gln Gly Thr Leu Val Thr Val Ser Ser
115 120

<210> 109

<211> 324

<212> DNA
<213> Homo sapiens

<400> 109
tcttctgagc tgactcagga ccctgctgtg tctgtggcct tgggacagac agtcaggatc 60
acatgccaag gagacagcct cagaaaactat tatgcaagtt ggtaccagca gaagccagga 120
caggccccta tacttgtcat ctatggtaaa aacaaccggc cctcagggat cccagaccca 180
ttctctggct ccagctcagg aaacacagct tccttgacca tcactggggc tcagggcgaa 240
gatgagggctg actattactg taactcccg gacagcagtg gtaatcatct ggtattcggc 300
ggagggacca agttgaccgt ccta 324

<210> 110
<211> 107
<212> PRT
<213> Homo sapiens

<400> 110
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Asn Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Ile Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Asn Ser Arg Asp Ser Ser Gly Asn His
85 90 95
Leu Val Phe Gly Gly Thr Lys Leu Thr Val
100 105

<210> 111
<211> 366
<212> DNA
<213> Homo sapiens

<400> 111
caggtgcagc tggtgagtc tgggggaggc gtggtccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagc agctatggca tgcactgggt ccggcaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggatg atgaaagaaa taaatacaat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgaat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagattta 300
acgtattacg atatttggg cggatggac gtctggggcc aaggaccac ggtcaccgtc 360
tcctca 366

<210> 112
<211> 122
<212> PRT
<213> Homo sapiens

<400> 112
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45

Ala	Val	Ile	Trp	Tyr	Asp	Gly	Arg	Asn	Lys	Tyr	Asn	Ala	Asp	Ser	Val
50						55			60						
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Asn
65					70				75			80			
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
						85			90			95			
Ala	Arg	Asp	Leu	Thr	Tyr	Tyr	Asp	Ile	Leu	Gly	Gly	Met	Asp	Val	Trp
						100		105				110			
Gly	Gln	Gly	Thr	Thr	Val	Thr	Val	Val	Ser	Ser					
						115		120							

<210> 113

<211> 333

<212> DNA

<213> Homo sapiens

<400> 113

cagtctgtgc	tgacgcagtc	gccctcagtg	tctggggccc	cagggcagag	ggtcaccatc	60
tcctgcactg	ggagcagctc	caacatcggg	gcaggttatg	atgtacactg	gtaccagcag	120
cttccaggaa	cagcccccag	actcctcatc	tatggttaaca	acaatcgtcc	ctcaggggtc	180
cctgaccgat	tctctggctc	caagtctggc	acctcagcct	ccctggccat	cactgggctc	240
caggctgagg	atgaggctga	ttattactgc	cagtcctatg	acagcagcct	gagtggttcg	300
gtgttcggcg	gagggaccaa	gctgaccgtc	cta			333

<210> 114

<211> 111

<212> PRT

<213> Homo sapiens

<400> 114

Gln	Ser	Val	Leu	Thr	Gln	Ser	Pro	Ser	Val	Ser	Gly	Ala	Pro	Gly	Gln
1					5				10			15			
Arg	Val	Thr	Ile	Ser	Cys	Thr	Gly	Ser	Ser	Ser	Asn	Ile	Gly	Ala	Gly
								20	25			30			
Tyr	Asp	Val	His	Trp	Tyr	Gln	Gln	Leu	Pro	Gly	Thr	Ala	Pro	Arg	Leu
								35	40			45			
Leu	Ile	Tyr	Gly	Asn	Asn	Arg	Pro	Ser	Gly	Val	Pro	Asp	Arg	Phe	
						50	55		60						
Ser	Gly	Ser	Lys	Ser	Gly	Thr	Ser	Ala	Ser	Leu	Ala	Ile	Thr	Gly	Leu
						65	70		75			80			
Gln	Ala	Glu	Asp	Glu	Ala	Asp	Tyr	Tyr	Cys	Gln	Ser	Tyr	Asp	Ser	Ser
						85	90		95						
Leu	Ser	Gly	Ser	Val	Phe	Gly	Gly	Thr	Lys	Leu	Thr	Val	Leu		
					100		105			110					

<210> 115

<211> 366

<212> DNA

<213> Homo sapiens

<400> 115

caggtgcagc	tggtgagtc	tgggggaggc	gtggtccagc	ctgggaggtc	cctgagactc	60
tcctgtgcag	cgtctggatt	cacccatcagc	agctatggca	tgcactgggt	ccgcccaggct	120
ccagccaagg	ggctggagtg	ggtggcagtt	atatggatg	atggaagaaa	taaatacaat	180
gcagactccg	tgaaggccg	attcaccatc	tccagagaca	attccaagaa	cacgctgaat	240
ctgcaaatga	acagccttag	agccgaggac	acggctgtgt	attactgtgc	gagagattta	300
acgtattacg	atattttggg	cggtatggac	gtctggggcc	aagggaccac	ggtcaccgtc	360

tcctca

366

<210> 116
<211> 122
<212> PRT
<213> Homo sapiens

<400> 116
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Arg Asn Lys Tyr Asn Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Asn
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Asp Leu Thr Tyr Tyr Asp Ile Leu Gly Gly Met Asp Val Trp
100 105 110
Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

<210> 117
<211> 324
<212> DNA
<213> Homo sapiens

<400> 117
tcttctgagc tgactcagga ccctgctgtg tctgtggct tgggacagac agtcaggatc 60
acatgccaag gagacagcct cagaagatat tatgcaagct ggtaccagca gaagccagga 120
caggcccta tagttgtcat ctatggtaaa aaaaaccggc cctcagggat cccagaccga 180
ttctctggct ccagctcagg aaacacagct tccttgacca tcactgggc tcaggcggaa 240
gatgaggcgt actattactg taagtcccg gacagcagtg gtaaccatct ggtattcggc 300
ggagggacca agctgaccgt ccta 324

<210> 118
<211> 108
<212> PRT
<213> Homo sapiens

<400> 118
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Arg Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Ile Val Val Ile Tyr
35 40 45
Gly Lys Lys Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Lys Ser Arg Asp Ser Ser Gly Asn His
85 90 95
Leu Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 119
<211> 345
<212> DNA
<213> Homo sapiens

<400> 119
gaggtgcagc tggggggc ttgatccagc ctgggggtc cctgagactc 60
tcctgtgcag cctctgggtt caccgtcagt agcaactaca tgagctgggt ccggccaggt 120
ccagggaaagg gtctggagtg ggtctcagtt atttatacg gttggggcac atactacgca 180
gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctgtatctt 240
caaataaca gcctgagagc cgaggacacg gccgtgtatt actgtgcgag aggaccgggg 300
tccttgact actggggcca gggaaaccctg gtcaccgtct cctca 345

<210> 120
<211> 115
<212> PRT
<213> Homo sapiens

<400> 120
Glu Val Gln Leu Val Glu Ser Gly Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Gly Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Gly Pro Gly Ser Phe Asp Tyr Trp Gly Gln Gly Thr Leu Val Thr
100 105 110
Val Ser Ser
115

<210> 121
<211> 321
<212> DNA
<213> Homo sapiens

<400> 121
gacatccaga tgacccagtc tccatcttcc gtgtctgcat ctgtaggaga cagagtcacc 60
atcacttgc gggcgagtca gggatttagc agctggtag cctggatca gcagaaacca 120
gggaaagccc ctaagctcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtgatc tgggacat tttactctca ccatcagcag cctgcagcct 240
gaagattttg caagttacta ttgtcaacag gctaacagtt tcccggtggac gttcggccaa 300
gggaccaagg tggaaatcaa a 321

<210> 122
<211> 107
<212> PRT
<213> Homo sapiens

<400> 122
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Val Ser Ala Ser Val Gly

1	5	10	15												
Asp	Arg	Val	Thr	Ile	Thr	Cys	Arg	Ala	Ser	Gln	Gly	Ile	Ser	Ser	Trp
				20				25					30		
Leu	Ala	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Lys	Ala	Pro	Lys	Leu	Leu	Ile
				35				40				45			
Tyr	Ala	Ala	Ser	Ser	Leu	Gln	Ser	Gly	Val	Pro	Ser	Arg	Phe	Ser	Gly
					50			55			60				
Ser	Gly	Ser	Gly	Thr	Asp	Phe	Thr	Leu	Thr	Ile	Ser	Ser	Leu	Gln	Pro
				65			70			75			80		
Glu	Asp	Phe	Ala	Ser	Tyr	Tyr	Cys	Gln	Gln	Ala	Asn	Ser	Phe	Pro	Trp
					85			90			95				
Thr	Phe	Gly	Gln	Gly	Thr	Lys	Val	Glu	Ile	Lys					
					100			105							

<210> 123

<211> 369

<212> DNA

<213> Homo sapiens

<400> 123

caggtgcagc	tggtgagtc	tggggaggc	gtggtccagc	ctgggaggc	cctgagactc	60
tcctgtgcag	cgtctggatt	cacccatgt	agctatggca	tgcactgggt	ccgcccaggct	120
ccagggcaagg	ggctggagtg	ggtggcagtt	atatggatg	atggaaagtat	taaatactat	180
gcagactccg	tgaaggccg	attcaccatc	tccagagaca	attccaagaa	cacgctgtat	240
ctgcaaatga	acagccttag	agccgaggac	acggctgtgt	attactgtgc	gagagagcgg	300
gatacgtgt	gctgtacta	ctacggatg	gacgtctggg	gccaaaggac	cacggtcacc	360
gtctcctca						369

<210> 124

<211> 123

<212> PRT

<213> Homo sapiens

<400> 124

Gln	Val	Gln	Leu	Val	Glu	Ser	Gly	Gly	Val	Val	Gln	Pro	Gly	Arg	
1				5				10				15			
Ser	Leu	Arg	Leu	Ser	Cys	Ala	Ala	Ser	Gly	Phe	Thr	Phe	Ser	Ser	Tyr
					20			25			30				
Gly	Met	His	Trp	Val	Arg	Gln	Ala	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val
					35			40			45				
Ala	Val	Ile	Trp	Tyr	Asp	Gly	Ser	Ile	Lys	Tyr	Tyr	Ala	Asp	Ser	Val
					50			55			60				
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Tyr
					65			70			75			80	
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
					85			90			95				
Ala	Arg	Glu	Arg	Asp	Ser	Ser	Gly	Trp	Tyr	Tyr	Tyr	Gly	Met	Asp	Val
					100			105			110				
Trp	Gly	Gln	Gly	Thr	Thr	Val	Thr	Val	Thr	Val	Ser	Ser			
					115			120							

<210> 125

<211> 321

<212> DNA

<213> Homo sapiens

<400> 125

gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgtaggaga cagagtacc 60
 atcacttgc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
 gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
 agttcagcg gcagtgatc tgggacagaa ttcaactctca cagtcagcag cctgcagcct 240
 gaagattttg caacttatta ctgtctacag cataatagtc tcccgctcac tttcggcgga 300
 gggaccaagg ttgagatcaa a 321

<210> 126
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 126
 Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
 1 5 10 15
 Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
 20 25 30
 Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
 35 40 45
 Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Val Ser Ser Leu Gln Pro
 65 70 75 80
 Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Leu Pro Leu
 85 90 95
 Thr Phe Gly Gly Gly Thr Lys Val Glu Ile Lys
 100 105

<210> 127
 <211> 378
 <212> DNA
 <213> Homo sapiens

<400> 127
 caggtgcagc tggggaggc gtggccagc ctggggaggc cctgagactc 60
 tcctgtgcag cgtctggatt cacccctgt aactatggca tgcactgggt cccgcaggct 120
 ccagccaagg ggctggagt ggtggcagtt atatggatg atggaaactaa taaataactat 180
 gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
 ctgcaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagggg 300
 atagcagtgg ctggccctcc ttactactac tacggatgg acgtctgggg ccaaggacc 360
 acggtcaccg tctcctca 378

<210> 128
 <211> 126
 <212> PRT
 <213> Homo sapiens

<400> 128
 Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asn Tyr
 20 25 30
 Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
 65 70 75 80

Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
		85						90					95		
Ala	Arg	Glu	Gly	Ile	Ala	Val	Ala	Gly	Pro	Pro	Tyr	Tyr	Tyr	Tyr	Gly
		100						105				110			
Met	Asp	Val	Trp	Gly	Gln	Gly	Thr	Thr	Val	Thr	Val	Ser	Ser		
		115					120				125				

<210>	129															
<211>	318															
<212>	DNA															
<213>	Homo sapiens															
<400>	129															
gacatccaga	tgacccagtc	tccatccctcc	ctgtctgcat	ctgtaggaga	cagagtccacc	60										
atcaacttgcc	aggcgagtca	ggacattagc	aactattaa	attggtatca	gcagaaaccca	120										
gggaaagccc	ctaagctcct	gatctacgat	gcatccaatt	tggaaacagg	ggtcccacatca	180										
aggttcagtg	gaagtggatc	tgggacagat	tttactttca	ccatcagcag	cctgcagcct	240										
gaagatattg	caacatatta	ctgtcaccag	tgtgataatc	tccctcactt	cggccaaggg	300										
acacgactgg	agattaaa					318										

<210>	130														
<211>	106														
<212>	PRT														
<213>	Homo sapiens														
<400>	130														
Asp	Ile	Gln	Met	Thr	Gln	Ser	Pro	Ser	Ser	Leu	Ser	Ala	Ser	Val	Gly
1			5				10					15			
Asp	Arg	Val	Thr	Ile	Thr	Cys	Gln	Ala	Ser	Gln	Asp	Ile	Ser	Asn	Tyr
				20				25				30			
Leu	Asn	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Lys	Ala	Pro	Lys	Leu	Leu	Ile
				35			40				45				
Tyr	Asp	Ala	Ser	Asn	Leu	Glu	Thr	Gly	Val	Pro	Ser	Arg	Phe	Ser	Gly
				50			55				60				
Ser	Gly	Ser	Gly	Thr	Asp	Phe	Thr	Phe	Thr	Ile	Ser	Ser	Leu	Gln	Pro
65					70				75				80		
Glu	Asp	Ile	Ala	Thr	Tyr	Tyr	Cys	His	Gln	Cys	Asp	Asn	Leu	Pro	His
					85			90				95			
Phe	Gly	Gln	Gly	Thr	Arg	Leu	Glu	Ile	Lys						
				100			105								

<210>	131														
<211>	369														
<212>	DNA														
<213>	Homo sapiens														
<400>	131														
caggtgcagc	tggtgagtc	tgggggaggc	gtggtccagc	ctgggaggtc	cctgagactc	60									
tcctgtgcag	cgtctggatt	aatcttcagt	agctatggca	tgcactgggt	ccgcccaggct	120									
ccagccaagg	ggctggagtg	ggtggcagtt	atatggtatg	atggaaagtaa	taaataactat	180									
cgagactccg	tgaagggccc	attcaccatc	tccagagaca	attccaagaa	cacgctgtat	240									
ctgcaatga	acagcctgag	agccgaggac	acggctgtgt	attactgtgc	gagagagcgg	300									
gatagcagtg	gctggtacta	ctacggtatg	gacgtctggg	gccaaaggac	cacggtcacc	360									
gtctcctca						369									

<210>	132														
<211>	123														

<212> PRT
<213> Homo sapiens

<400> 132
Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Leu Ile Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Arg Asp Ser Ser Gly Trp Tyr Tyr Tyr Gly Met Asp Val
100 105 110
Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

<210> 133
<211> 321
<212> DNA
<213> Homo sapiens

<400> 133
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtccacc 60
atcacttgcc gggcaagtca ggccattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcctccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtcgatc tgggacagaa ttcaccctca caatcagcag cctgcagcct 240
gaagattttg caagtttata ctgtctacag cataggagtt acccgctcac tttcggcgg 300
gggaccaagg tggagatcaa a 321

<210> 134
<211> 107
<212> PRT
<213> Homo sapiens

<400> 134
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Ala Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Arg Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Ser Tyr Tyr Cys Leu Gln His Arg Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 135
<211> 345

<212> DNA
<213> Homo sapiens

<400> 135
gaggtgcagc tggggggc ttgatccagc ctgggggtc cctgagactc 60
tcctgtgcag cctctgggtt caccgtcagt agcaactaca tgagctgggt ccggccaggt 120
ccagggaaagg ggctggagtg ggtctcagtt atttatacg cgtggtagcac atactacgca 180
gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctgtatctt 240
caaataaca gcctgagacg cgaggacacg gccgtgtatt actgtgcgag aggcgaagga 300
ggatggacg tctggggcca agggaccacg gtcaccgtct cctca 345

<210> 136
<211> 115
<212> PRT
<213> Homo sapiens

<400> 136
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Gly Ser Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Gly Glu Gly Gly Met Asp Val Trp Gly Gln Gly Thr Thr Val Thr
100 105 110
Val Ser Ser
115

<210> 137
<211> 321
<212> DNA
<213> Homo sapiens

<400> 137
gaaatagtga tgacgcagtc tccatccacc ctgtctgtgt ctccaggga aagagccacc 60
ctctcctgca gggccagtca gagtgttagc agcaacttag cctggtagca gcagaaacct 120
ggccaggctc ccaggctcct catctatggt gcatccatca gggccactgg tatcccagcc 180
agtttcagtg gcagtgggtc tgggacagag tacactctca ccattcagcag cctgcagtct 240
gaagattttgc agtttattatctgtcaacag tataataact ggccattcac ttccggccct 300
gggaccaaaag tggatataaa 321

<210> 138
<211> 107
<212> PRT
<213> Homo sapiens

<400> 138
Glu Ile Val Met Thr Gln Ser Pro Ser Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ser Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile

35	40	45													
Tyr	Gly	Ala	Ser	Ile	Arg	Ala	Thr	Gly	Ile	Pro	Ala	Arg	Phe	Ser	Gly
50		55				60									
Ser	Gly	Ser	Gly	Thr	Glu	Tyr	Thr	Leu	Thr	Ile	Ser	Ser	Leu	Gln	Ser
65				70				75						80	
Glu	Asp	Phe	Ala	Val	Tyr	Tyr	Cys	Gln	Gln	Tyr	Asn	Asn	Trp	Pro	Phe
					85			90					95		
Thr	Phe	Gly	Pro	Gly	Thr	Lys	Val	Asp	Ile	Lys					
					100			105							

<210> 139
<211> 348
<212> DNA
<213> Homo sapiens

<400> 139
caggtgcagc tggggagtc tggggaggc ttggtaaagc ctggagggtc cctgagactc 60
tcctgtgcag cctctggatt caccttcgt gactactaca tgagctggat ccggccaggct 120
ccagggaaagg ggctggagtg ggtttcatac attagtagaa gtggtagtac cataatactac 180
gcagactctg tgaaggccg attcaccatc tccagggaca acggcaagaa ctcactgtat 240
ctgcaaatga acagcctgag agccgaggac acggccgtgt attactgtgc gagatcttta 300
ggcggtatgg acgtctgggg ccaagggacc acggtaaccg tctcctca 348

<210> 140
<211> 116
<212> PRT
<213> Homo sapiens

<400> 140
Gln Val Gln Leu Val Glu Ser Gly Gly Leu Val Lys Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asp Tyr
20 25 30
Tyr Met Ser Trp Ile Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Tyr Ile Ser Arg Ser Gly Ser Thr Ile Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn Ser Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Ser Leu Gly Gly Met Asp Val Trp Gly Gln Gly Thr Thr Val
100 105 110
Thr Val Ser Ser
115

<210> 141
<211> 321
<212> DNA
<213> Homo sapiens

<400> 141
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgtaggaga cagagtcgcc 60
atcaattgcc ggacaagtcg gaggattagc agttatttaa attggtatca gcagaaacca 120
gggaaagccc ctgagctct gatctatgct gcatccaatt tgcaaagtgg ggtcccatca 180
aggttcagtg gcagtggatc tgggacagat ttcactctca ccatcagcag tctgcaacct 240
gaagattttg caacttacta ctgtcaacag agttccagta ccctcatcac ctgcggccaa 300

gggacacgac tggagattaa a

321

<210> 142
<211> 107
<212> PRT
<213> Homo sapiens

<400> 142
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Ala Ile Thr Cys Arg Thr Ser Gln Ser Ile Ser Ser Tyr
20 25 30
Leu Asn Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Glu Leu Leu Ile
35 40 45
Tyr Ala Ala Ser Asn Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Gln Gln Ser Ser Ser Thr Leu Ile
85 90 95
Thr Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys
100 105

<210> 143
<211> 345
<212> DNA
<213> Homo sapiens

<400> 143
gagggtgcagc tgggtggagtc tggaggaggc ttgatccagc ctggggggtc cctgagactc 60
tcctgtgcag cctctgggtt caccgtcagt agcaactacg tgaactgggt ccggccaggct 120
ccagggaaagg ggctggagtg ggtctcagtt atttataaagc ctggtagcgc gtactacgca 180
gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctgtttttt 240
caaataaca gcctgagagc cgaggacacg gccgtgtatt actgtgcgag aggaactggg 300
gcctttgact actggggcca gggaaaccctg gtcaccgtct cctca 345

<210> 144
<211> 115
<212> PRT
<213> Homo sapiens

<400> 144
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Val Asn Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Asn Ala Gly Ser Ala Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Phe Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Gly Thr Gly Ala Phe Asp Tyr Trp Gly Gln Gly Thr Leu Val Thr
100 105 110
Val Ser Ser
115

<210> 145
<211> 321
<212> DNA
<213> Homo sapiens

<400> 145
gaaatagtga tgacgcagtc tccagccacc ctgtctgtgt ctccagggga aagagccacc 60
ctctcctgca gggccagtca gagtgttagc agcaacttag cctggtagca gcagaaacct 120
ggccaggctc ccagactcct catctatggt gcatccacca gggccactgg tatcccagcc 180
aggttcagtg gcagtaggac tgggacagag ttcactctca ccattcagcag cctgcagtct 240
gaagattttg cagtttatta ctgtcagcag tataataact ggcctctcac tttcggcggga 300
gggaccaagg tggagatcaa a 321

<210> 146
<211> 107
<212> PRT
<213> Homo sapiens

<400> 146
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ser Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
Tyr Gly Ala Ser Thr Arg Ala Thr Gly Ile Pro Ala Arg Phe Ser Gly
50 55 60
Ser Arg Thr Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Asn Trp Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 147
<211> 348
<212> DNA
<213> Homo sapiens

<400> 147
caggtgcagc tgggggaggc ttggtaaagc ctggagggtc cctgagactc 60
tcctgtgcag cctctggatt caccttca gactactaca tgagctggat cccgcaggct 120
ccagggaaagg ggctggagtg ggtttcatac attagtagaa gtggtagtac catatactac 180
gcagactctg tgaaggcccg attcaccatc tccagggaca acgccaagaa ctcactgtat 240
ctgcaaatga acagcctgag agccgaggac acggccgtgt attactgtgc gagatctta 300
ggcggtatgg acgtctgggg ccaagggacc acggtcaccg ttcctca 348

<210> 148
<211> 116
<212> PRT
<213> Homo sapiens

<400> 148
Gln Val Gln Leu Val Glu Ser Gly Gly Leu Val Lys Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asp Tyr

20	25	30	
Tyr Met Ser Trp Ile Arg Gln Ala Pro Gly Lys Gly	Leu Glu Trp Val		
35	40	45	
Ser Tyr Ile Ser Arg Ser Gly Ser Thr Ile Tyr Tyr	Ala Asp Ser Val		
50	55	60	
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys	Asn Ser Leu Tyr		
65	70	75	80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala	Val Tyr Tyr Cys		
85	90	95	
Ala Arg Ser Leu Gly Gly Met Asp Val Trp Gly Gln	Gly Thr Thr Val		
100	105	110	
Thr Val Ser Ser			
115			

<210> 149
<211> 321
<212> DNA
<213> Homo sapiens

<400> 149
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgtaggaga cagagtcacc 60
atcacttgcc ggacaagtca gagcattagc agctattta actggtatca ccagaaacca 120
gggaaagccc ctgagctcct gatctatgct gcattcaatt tacaaaagtgg ggtcccatca 180
aggttcagtg gcagtggtatc tgggacagat ttcaactctca ccatcagcag tctgcaacct 240
gaagattttg caacttacta ctgtcaacag agttccagta ccctcatcac cttcggccaa 300
gggacacgac tggagattaa a 321

<210> 150
<211> 107
<212> PRT
<213> Homo sapiens

<400> 150
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Thr Ser Gln Ser Ile Ser Ser Tyr
20 25 30
Leu Asn Trp Tyr His Gln Lys Pro Gly Lys Ala Pro Glu Leu Leu Ile
35 40 45
Tyr Ala Ala Phe Asn Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Gln Gln Ser Ser Ser Thr Leu Ile
85 90 95
Thr Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys
100 105

<210> 151
<211> 345
<212> DNA
<213> Homo sapiens

<400> 151
gaggtgcagc tgggtggagtc tggaggaggc ttgatccagc ctggggggtc cctgagactc 60
tcctgtgcag cctctgggtt caccgtcagt agcaactaca tgagctgggt ccgccaggt 120
ccagggaaagg ggctggagtg ggtctcagtt atttatagcg gtggtagcac atactacgca 180

gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctgtatctt 240
caaataaca gcctgagagc cgaggacacg gccgtgtatt actgtgcgag aggcgaagga 300
ggtatggacg tctggggcca agggaccacg gtcaccgtct cctca 345

<210> 152
<211> 115
<212> PRT
<213> Homo sapiens

<400> 152
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Gly Ser Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Gly Glu Gly Gly Met Asp Val Trp Gly Gln Gly Thr Thr Val Thr
100 105 110
Val Ser Ser
115

<210> 153
<211> 324
<212> DNA
<213> Homo sapiens

<400> 153
tcctatgagc tgacacagcc accctcggtg tcagtgtccc caggacaaac ggccaggatc 60
acctgctctg gagatgcatt gccaaaaaaaa tatgtttatt ggtaccagca gaagtcaggc 120
caggcccttg tgctggcat ctatgaggac agcaaacgac cctccggat ccctgagaga 180
ttctctggct ccagctcagg gacaatggcc accttgacta tcaatggggc ccaggtggag 240
gatgaagctg actactactg ttactcaacg gacagcagtg gtaatcatgt ggtattcggc 300
ggagggacca agctgaccgt ccta 324

<210> 154
<211> 108
<212> PRT
<213> Homo sapiens

<400> 154
Ser Tyr Glu Leu Thr Gln Pro Pro Ser Val Ser Val Pro Gly Gln
1 5 10 15
Thr Ala Arg Ile Thr Cys Ser Gly Asp Ala Leu Pro Lys Lys Tyr Val
20 25 30
Tyr Trp Tyr Gln Gln Lys Ser Gly Gln Ala Pro Val Leu Val Ile Tyr
35 40 45
Glu Asp Ser Lys Arg Pro Ser Gly Ile Pro Glu Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Thr Met Ala Thr Leu Thr Ile Asn Gly Ala Gln Val Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Tyr Ser Thr Asp Ser Ser Gly Asn His
85 90 95

Val Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 155

<211> 321

<212> DNA

<213> Homo sapiens

<400> 155

gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtacc 60
atcacttgcc ggacaagtca gagcattagc agctatttaa attgttatca gcagaaacca 120
gggaaagccc ctgaggtctt gatctatgct gcatccaatt tgcaacgtgg ggtcccatca 180
aggttcagtgc gagtggtatc tggacagat ttcactctca ccatcagcag tctgcaacct 240
gaagattttg caacttacta ctgtcaacag agttccagta ccctcatcac cttcggccaa 300
gggacacgac tggagattaa a 321

<210> 156

<211> 107

<212> PRT

<213> Homo sapiens

<400> 156

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Thr Ser Gln Ser Ile Ser Ser Tyr
20 25 30
Leu Asn Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Glu Val Leu Ile
35 40 45
Tyr Ala Ala Ser Asn Leu Gln Arg Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Gln Gln Ser Ser Ser Thr Leu Ile
85 90 95
Thr Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys
100 105

<210> 157

<211> 369

<212> DNA

<213> Homo sapiens

<400> 157

gaggtgcagc tggggaggc ctggtaagc ctggggggc cctgagactc 60
tcctgtgcag cctctggatt cacccatgt agctatagca tgaactgggt ccggcaggct 120
ccagggagg ggctggatg ggtctcatct attagtagta gtagtagtta catatactac 180
gcagactcag tgaaggccg attcaccatc tccagagaca acgccaagaa ctcactgtat 240
ctgcaatga acagcctgag agccgaggac acggctgtgt attactgtgc gaggggggt 300
ataactggaa ctacgaacta ctacggatg gacgtctggg gccaaggac cacggtcacc 360
gtctcctca 369

<210> 158

<211> 123

<212> PRT

<213> Homo sapiens

<400> 158

Glu Val Gln Leu Val Glu Ser Gly Gly Gly Leu Val Lys Pro Gly Gly
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
 20 25 30
 Ser Met Asn Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ser Ser Ile Ser Ser Ser Ser Tyr Ile Tyr Tyr Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn Ser Leu Tyr
 65 70 75 80
 Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Arg Gly Gly Ile Thr Gly Thr Asn Tyr Tyr Gly Met Asp Val
 100 105 110
 Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
 115 120

<210> 159
 <211> 321
 <212> DNA
 <213> Homo sapiens

<400> 159
 gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgtaggaga cagagtccacc 60
 atcacttgcc ggacaagtca gagcattagc agctatttaa attggtatca gcagaaacca 120
 gggaaagccc ctgaactcct gatctatgct gcatttaatt tgcaaagtgg ggtcccatca 180
 aggatcagtg gcagtggtac tgggacagat ttcactctca ccatcagcag tctgcaccct 240
 gaagattttg caacttacta ctgtcaacag agttccagta ccctcatcac cttcggccaa 300
 gggacacgac tggagattaa a 321

<210> 160
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 160
 Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
 1 5 10 15
 Asp Arg Val Thr Ile Thr Cys Arg Thr Ser Gln Ser Ile Ser Ser Tyr
 20 25 30
 Leu Asn Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Glu Leu Leu Ile
 35 40 45
 Tyr Ala Ala Phe Asn Leu Gln Ser Gly Val Pro Ser Arg Ile Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Ser Ser Leu His Pro
 65 70 75 80
 Glu Asp Phe Ala Thr Tyr Tyr Cys Gln Gln Ser Ser Ser Thr Leu Ile
 85 90 95
 Thr Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys
 100 105

<210> 161
 <211> 375
 <212> DNA
 <213> Homo sapiens

<400> 161

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caggtgcagc tggtcagtc tgggctgag gtgaagaagc ctggggcctc agtgaaggc 60
tcctcaagg cttctggata caccttcacc ggctactata tgcactgggt ggcacaggcc 120
cctggacaag ggcttgagtg gatggatgg atcaacccta acagtggtgg cacaaactat 180
gcacagaagt ttcagggcag ggtcaccatg accagggaca cgtccatcag cacagcctac 240
atggagctga gcaggctgag atctgacgac acggccgtgt attactgtgc gagagccct 300
ctctggacgg tacgttagctg gtactactac ggtatggacg tctgggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 162
<211> 125
<212> PRT
<213> Homo sapiens

<400> 162
Gln Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Ala
1 5 10 15
Ser Val Lys Val Ser Cys Lys Ala Ser Gly Tyr Thr Phe Thr Gly Tyr
20 25 30
Tyr Met His Trp Val Arg Gln Ala Pro Gly Gln Gly Leu Glu Trp Met
35 40 45
Gly Trp Ile Asn Pro Asn Ser Gly Gly Thr Asn Tyr Ala Gln Lys Phe
50 55 60
Gln Gly Arg Val Thr Met Thr Arg Asp Thr Ser Ile Ser Thr Ala Tyr
65 70 75 80
Met Glu Leu Ser Arg Leu Arg Ser Asp Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Ala Pro Leu Trp Thr Val Arg Ser Trp Tyr Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 163
<211> 330
<212> DNA
<213> Homo sapiens

<400> 163
cagtcgtat tgacgcagcc gccctcaatg tctgcggccc caggacagaa ggtcaccatc 60
tcctgctctg gaagcagctc caacattggg aataattatg tattcgttgc ccagcagctc 120
ccaggaatacg ccccaaaact cctcatttat gacaataata agcgaccctc agggattcct 180
gaccgattct ctggctccaa gtctggcacg tcagccaccc tgggcatcac cggactccag 240
actggggacg aggccgatta ttactgcgga acatggata gcagcctgag tgctgggtg 300
ttcggcggag ggaccaagct gaccgtccta 330

<210> 164
<211> 110
<212> PRT
<213> Homo sapiens

<400> 164
Gln Ser Val Leu Thr Gln Pro Pro Ser Met Ser Ala Ala Pro Gly Gln
1 5 10 15
Lys Val Thr Ile Ser Cys Ser Gly Ser Ser Ser Asn Ile Gly Asn Asn
20 25 30
Tyr Val Ser Trp Tyr Gln Gln Leu Pro Gly Ile Ala Pro Lys Leu Leu
35 40 45
Ile Tyr Asp Asn Asn Lys Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser
50 55 60

Gly Ser Lys Ser Gly Thr Ser Ala Thr Leu Gly Ile Thr Gly Leu Gln
65 70 75 80
Thr Gly Asp Glu Ala Asp Tyr Tyr Cys Gly Thr Trp Asp Ser Ser Leu
85 90 95
Ser Ala Gly Val Phe Gly Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 165
<211> 348
<212> DNA
<213> Homo sapiens

<400> 165
gaggtgcagc tgggtgcagtc tggagcagag gtgaaaaagc ccggggagtc tctgaagatc 60
tcctgttaaga cttctgttaata cagctttacc agctacttgg a tcggctgggt gcgccagatg 120
cccgaaag gcctggagtg gatggggatc atctatcttgc tgactcaga taccagatac 180
agccgcctt tccaaaggcca ggtcaccatc tcagccgaca agtccatcag taccgcctac 240
ctgcagtgg a gcagcctgaa ggcctcgac accgcatgtt attactgtgc gagaagtaac 300
tgggtcttg actactgggg ccagggacc ctggtcaccg tctcctca 348

<210> 166
<211> 116
<212> PRT
<213> Homo sapiens

<400> 166
Glu Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Glu
1 5 10 15
Ser Leu Lys Ile Ser Cys Lys Thr Ser Glu Tyr Ser Phe Thr Ser Tyr
20 25 30
Trp Ile Gly Trp Val Arg Gln Met Pro Gly Lys Gly Leu Glu Trp Met
35 40 45
Gly Ile Ile Tyr Leu Gly Asp Ser Asp Thr Arg Tyr Ser Pro Ser Phe
50 55 60
Gln Gln Gln Val Thr Ile Ser Ala Asp Lys Ser Ile Ser Thr Ala Tyr
65 70 75 80
Leu Gln Trp Ser Ser Leu Lys Ala Ser Asp Thr Ala Met Tyr Tyr Cys
85 90 95
Ala Arg Ser Asn Trp Gly Leu Asp Tyr Trp Gly Gln Gly Thr Leu Val
100 105 110
Thr Val Ser Ser
115

<210> 167
<211> 333
<212> DNA
<213> Homo sapiens

<400> 167
cagtcgtgc tgacgcagcc gccctcagtg tctggggccc cagggcagag ggtcaccatc 60
tcctgcactg ggagcagttc caacatcggtt gcaaggatatc atgtacactg gtaccagcag 120
tttccagggaa cagcccccaa actcctcatc caaggtaaca gcaatcggtt ctcagggttc 180
cctgaccgat tctctggctc caagtctggc acctcagcct ccctggccat cactgggttc 240
caggctgagg atgaggctga ttattactgc cagtcctatg acagcagcct gagtggttc 300
gtgttcggcg gagggaccaa gctgaccgtc ctt 333

<210> 168

<211> 111
<212> PRT
<213> Homo sapiens

<400> 168
Gln Ser Val Leu Thr Gln Pro Pro Ser Val Ser Gly Ala Pro Gly Gln
1 5 10 15
Arg Val Thr Ile Ser Cys Thr Gly Ser Ser Ser Asn Ile Gly Ala Gly
20 25 30
Tyr Asp Val His Trp Tyr Gln Gln Phe Pro Gly Thr Ala Pro Lys Leu
35 40 45
Leu Ile Gln Gly Asn Ser Asn Arg Pro Ser Gly Val Pro Asp Arg Phe
50 55 60
Ser Gly Ser Lys Ser Gly Thr Ser Ala Ser Leu Ala Ile Thr Gly Leu
65 70 75 80
Gln Ala Glu Asp Glu Ala Asp Tyr Tyr Cys Gln Ser Tyr Asp Ser Ser
85 90 95
Leu Ser Gly Ser Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 169
<211> 351
<212> DNA
<213> Homo sapiens

<400> 169
caggttcagc tggtcagtc tggagctgag gtgaagaagc ctggggcctc agtgaaggc 60
tcctgcaagg cttctggta caccttacg ttctatagtt tcacctgggt gcgacaggcc 120
cctggacaag ggcttgagt gatggatgg atcagcgctt acaatgataa cacaactat 180
gcacagaagc tccaggccag agtcaccatg accacagaca catccacgag cacagcctac 240
atggactga ggagcctgag atctgacgac acggccgtgt attactgtgc gagaacgtt 300
accagtggct ttgactactg gggccaggga accctggta ccgtctccctc a 351

<210> 170
<211> 117
<212> PRT
<213> Homo sapiens

<400> 170
Gln Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Ala
1 5 10 15
Ser Val Lys Val Ser Cys Lys Ala Ser Gly Tyr Thr Phe Thr Phe Tyr
20 25 30
Ser Ile Thr Trp Val Arg Gln Ala Pro Gly Gln Gly Leu Glu Trp Met
35 40 45
Gly Trp Ile Ser Ala Tyr Asn Asp Asn Thr Asn Tyr Ala Gln Lys Leu
50 55 60
Gln Gly Arg Val Thr Met Thr Thr Asp Thr Ser Thr Ser Thr Ala Tyr
65 70 75 80
Met Glu Leu Arg Ser Leu Arg Ser Asp Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Thr Phe Thr Ser Gly Phe Asp Tyr Trp Gly Gln Gly Thr Leu
100 105 110
Val Thr Val Ser Ser
115

<210> 171

<211> 324
<212> DNA
<213> Homo sapiens

<400> 171
tcttctgagc tgactcagga ccctgctgtg tctgtggcct tgggacagac agtcaggatc 60
acatgccaag gagacagcct cagaaggat tatgcaagct ggtaccagca gaagccagga 120
caggccccta tacttgtcat ctatggtaaa aacaaccggc cctcaggat cccagaccga 180
ttctctggct ccagctcagg aaacacagct tccttgacca tcactgggc tcaggcggaa 240
gatgaggctg actattactg taactcccgg gacagcagtg gtaaccatct ggtgttcggc 300
ggagggacca agctgaccgt ccta 324

<210> 172
<211> 108
<212> PRT
<213> Homo sapiens

<400> 172
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Arg Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Ile Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Asn Ser Arg Asp Ser Ser Gly Asn His
85 90 95
Leu Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 173
<211> 375
<212> DNA
<213> Homo sapiens

<400> 173
caggtgcagc tggtgagtc tgggggaggc gtggccagc ctgggaggtc cctgagactc 60
tcctgtgcag cgtctggatt taccttcagt agttatgaca tgcactgggt ccggcaggct 120
ccaggaagg ggctggagtg ggtggcagtt atatggatg atggaaagtaa taaataccat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagaat 300
actatggttc ggggggggga ctactactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 174
<211> 125
<212> PRT
<213> Homo sapiens

<400> 174
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Asp Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val

35	40	45	
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr His	Ala Asp Ser Val		
50	55	60	
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys	Asn Thr Leu Tyr		
65	70	75	80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala	Val Tyr Tyr Cys		
85	90	95	
Ala Arg Glu Asn Thr Met Val Arg Gly Gly Asp Tyr	Tyr Tyr Gly Met		
100	105	110	
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser	Ser		
115	120	125	

<210> 175
<211> 321
<212> DNA
<213> Homo sapiens

<400> 175
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
aggaagccc ctaagcgctt gatctttgct gcgtccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggtatc tggccagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcggaa 300
gggaccaagg tggagatcaa a 321

<210> 176
<211> 107
<212> PRT
<213> Homo sapiens

<400> 176
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Arg Lys Ala Pro Lys Arg Leu Ile
35 40 45
Phe Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Pro Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 177
<211> 354
<212> DNA
<213> Homo sapiens

<400> 177
caggtgcagc tgcaggagtc gggcccagga ctggtaagc ctccggagac cctgtccctc 60
acctgcactg tctctgggtgg ctccatca gtttactact ggagctggat ccggcagccc 120
ccagggaaagg gactggatg gattgggtat ttctattaca gtgggagcac caactacaac 180
ccctccctca agatcgagt caccatataca gtagacacgt ccaagaacca gttctccctg 240
aagctgaggt ctgtgaccgc tgccggacacg gcccgtgtatt actgtgcgag agataggtt 300

accagtggttggctt ggtttgacta ctggggccag ggaaccctgg tcaccgtctc ctca 354

<210> 178

<211> 118

<212> PRT

<213> Homo sapiens

<400> 178

Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Glu
1 5 10 15

Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Tyr
20 25 30

Tyr Trp Ser Trp Ile Arg Gln Pro Pro Gly Lys Gly Leu Glu Trp Ile
35 40 45

Gly Tyr Phe Tyr Tyr Ser Gly Ser Thr Asn Tyr Asn Pro Ser Leu Lys
50 55 60

Ser Arg Val Thr Ile Ser Val Asp Thr Ser Lys Asn Gln Phe Ser Leu
65 70 75 80

Lys Leu Arg Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95

Arg Asp Arg Phe Thr Ser Gly Trp Phe Asp Tyr Trp Gly Gln Gly Thr
100 105 110

Leu Val Thr Val Ser Ser
115

<210> 179

<211> 321

<212> DNA

<213> Homo sapiens

<400> 179

gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgttaggaga cagagtacc 60

atcaacttgcg gggcaagtca gggcattaga aatgatttag gctgttatca gcagaaacca 120

aggaaagccc ctaagcgcct gatctttgct gcgtccagg tgcaaagtgg ggtcccatca 180

aggttcagcg gcagtggatc tggccagaa ttcactctca caatcagcag cctgcagcct 240

gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgg 300

gggaccaagg tggagatcaa a 321

<210> 180

<211> 107

<212> PRT

<213> Homo sapiens

<400> 180

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15

Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30

Leu Gly Trp Tyr Gln Gln Lys Pro Arg Lys Ala Pro Lys Arg Leu Ile
35 40 45

Phe Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60

Ser Gly Ser Gly Pro Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80

Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95

Thr Phe Gly Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 181
<211> 345
<212> DNA
<213> Homo sapiens

<400> 181
gagggtcagc tgggtggagtc tggaggaggc ttgatccagc ctggggggtc cctgagactc 60
tcctgtcagc cctctgggtt caccgtcagt aacaactaca tgcactgggt ccggccaggct 120
ccagggaaagg ggctggagtg ggtctcagtt atttatacgcg gtggtaacac atactacgca 180
gactccgtga agggccgatt caccatctcc agagacaatt ccaagaacac gctatttctt 240
caaataaca gcctgaaaac cgaggacacg gccgtgtatt actgtgcgag aggtcccccggg 300
gctttgtata tctggggcca agggacaatg gtcaccgtct cttca 345

<210> 182
<211> 115
<212> PRT
<213> Homo sapiens

<400> 182
Glu Val Gln Leu Val Glu Ser Gly Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Asn Asn
20 25 30
Tyr Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Gly Asn Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Phe Leu
65 70 75 80
Gln Met Asn Ser Leu Lys Thr Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Gly Pro Gly Ala Phe Asp Ile Trp Gly Gln Gly Thr Met Val Thr
100 105 110
Val Ser Ser
115

<210> 183
<211> 321
<212> DNA
<213> Homo sapiens

<400> 183
gaaatagtga tgacgcagtc tccagccacc ctgtctgtgt ctccagggga aagagtccacc 60
ctctcctgca gggccagtca gagtgcattacc agcaacttag cctggtagca gcagaaacct 120
ggccaggctc ccaggctctt catctatggt gcatccacca gggccactgg tatcccagcc 180
agattcagtg gcagtggttc tgggacagag ttcaactctca ccattcagcag cctgcagtct 240
gaagattttg cagtttattt ctgtcagcag tataataact ggcctttcac cttcggccaa 300
gggacacacgac tggagattaa a 321

<210> 184
<211> 107
<212> PRT
<213> Homo sapiens

<400> 184
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly

1	5	10	15												
Glu	Arg	Val	Thr	Leu	Ser	Cys	Arg	Ala	Ser	Gln	Ser	Ala	Thr	Ser	Asn
20				25								30			
Leu	Ala	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Gln	Ala	Pro	Arg	Leu	Leu	Ile
35				40								45			
Tyr	Gly	Ala	Ser	Thr	Arg	Ala	Thr	Gly	Ile	Pro	Ala	Arg	Phe	Ser	Gly
50				55								60			
Ser	Gly	Ser	Gly	Thr	Glu	Phe	Thr	Leu	Thr	Ile	Ser	Ser	Leu	Gln	Ser
65				70								75			80
Glu	Asp	Phe	Ala	Val	Tyr	Tyr	Cys	Gln	Gln	Tyr	Asn	Asn	Trp	Pro	Phe
85					90								95		
Thr	Phe	Gly	Gln	Gly	Thr	Arg	Leu	Glu	Ile	Lys					
					100						105				

<210> 185

<211> 345

<212> DNA

<213> Homo sapiens

<400> 185

gaggtgcagc	tgggtggagtc	tggaggaggc	ttgatccagc	ctgggggtc	cctgagactc	60
tcctgtgcag	cctctgggtt	caccgtcagt	agcaactaca	ttagttgggt	ccgcccaggct	120
ccagggaaagg	ggctggagtg	ggtctcagtt	atttatagcg	gtggtagcac	atactacgca	180
gactccgtga	agggccgatt	caccatctcc	agagacaatt	ccaagaacac	gctgtatctt	240
caaataaca	gcctgagagc	cgaggacacg	gccgtgtatt	actgtgcgag	aggtcccccggg	300
gttttgcata	tctggggcca	agggacaatg	gtcaccgtct	cttca		345

<210> 186

<211> 115

<212> PRT

<213> Homo sapiens

<400> 186

Glu	Val	Gln	Leu	Val	Glu	Ser	Gly	Gly	Gly	Leu	Ile	Gln	Pro	Gly	Gly
1				5				10			15				
Ser	Leu	Arg	Leu	Ser	Cys	Ala	Ala	Ser	Gly	Phe	Thr	Val	Ser	Ser	Asn
								20		25				30	
Tyr	Met	Ser	Trp	Val	Arg	Gln	Ala	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val
								35		40				45	
Ser	Val	Ile	Tyr	Ser	Gly	Gly	Ser	Thr	Tyr	Tyr	Ala	Asp	Ser	Val	Lys
								50		55				60	
Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Tyr	Leu
								65		70				75	
Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys	Ala
								85		90				95	
Arg	Gly	Pro	Gly	Ala	Phe	Asp	Ile	Trp	Gly	Gln	Gly	Thr	Met	Val	Thr
								100		105				110	
Val	Ser	Ser													
								115							

<210> 187

<211> 327

<212> DNA

<213> Homo sapiens

<400> 187

gacatccaga	tgacccagtc	tccatcctcc	ctgtctgcat	ctgtaggaga	cagagtccacc	60
------------	------------	------------	------------	------------	-------------	----

atcacttgcc gggcaagtca gggcattaga aatgatttag gctggttca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccaatt ttctaagtgg ggtcccatca 180
aggttcagcg gcagtggtc tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattta caacttatta ctgtctacag cataatcctt accctccgag gtcactttc 300
ggcggaggga ccaaggtaga gatcaaa 327

<210> 188
<211> 109
<212> PRT
<213> Homo sapiens

<400> 188
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Phe Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Asn Phe Leu Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Thr Thr Tyr Tyr Cys Leu Gln His Asn Pro Tyr Pro Pro
85 90 95
Arg Leu Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 189
<211> 363
<212> DNA
<213> Homo sapiens

<400> 189
caggtgcagc tgggtggagtc tgggggaggc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtgcag cgtctggatt cacttcagt agctatggca tgcactgggt ccggccaggct 120
ccagggcaagg ggctggagtg ggtggcagtt atatggtatg atggaaagtaa taaatactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagccttag agccgaggac acggctgtgt attactgtgc gagagagggg 300
gactacggtg gtaaccctta ctttactac tggggccagg gaaccctggc caccgtctcc 360
tca 363

<210> 190
<211> 121
<212> PRT
<213> Homo sapiens

<400> 190
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys

	85	90	95
Ala Arg Glu Gly Asp Tyr Gly Gly Asn Pro Tyr Phe Asp Tyr Trp Gly			
100	105	110	
Gln Gly Thr Leu Val Thr Val Ser Ser			
115	120		

<210> 191
<211> 324
<212> DNA
<213> Homo sapiens

<400> 191
tcttctgagc tgactcagga ccctgctgtg tctgtggct tggcacagac agtcaggatc 60
acatgccaag gagacagcct cagaagctat tatgcaagct ggtaccagca gaagccagga 120
caggcccctg tacttgtcat ctatggtaaa aacaaccggc cctcagggat cccagaccga 180
ttctctggct ccagctcaga aaacacagct tccttgacca tcactgggc tcaggcggaa 240
gatgagggctg actattactg taagtcccg gacagcagtt ttaaccatct ggtattcggc 300
ggagggacca agttgaccgt ccta 324

<210> 192
<211> 108
<212> PRT
<213> Homo sapiens

<400> 192
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Ser Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Val Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Glu Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Lys Ser Arg Asp Ser Ser Phe Asn His
85 90 95
Leu Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 193
<211> 363
<212> DNA
<213> Homo sapiens

<400> 193
caggtgcacc tggtgagtc tggggaggc gtggccagc ctggaggc cctgagactc 60
tcctgtgcag cgtctggatt cacctcagt agctatggca tgcactgggt ccggcaggct 120
ccagggcagg ggctggagtg ggtggcagtt atatggcatg atgaaagtaa taaatactat 180
gcagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaatga acagccttag agccgaggac acggctgtgt attactgtac aagagagggg 300
gactacggtg gttaccctta ctttgactac tggggccagg gaaccctggc caccgtctcc 360
tca 363

<210> 194
<211> 121
<212> PRT

<213> Homo sapiens

<400> 194

Gln Val His Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp His Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Thr Arg Glu Gly Asp Tyr Gly Gly Tyr Pro Tyr Phe Asp Tyr Trp Gly
100 105 110
Gln Gly Thr Leu Val Thr Val Ser Ser
115 120

<210> 195

<211> 324

<212> DNA

<213> Homo sapiens

<400> 195

tcttctgagc tgactcagga ccctgctgtg tctgtggcct tgggacagac agtcaggatc 60
acatgccaag gagacatcct cagaagctat tatgcaagct ggtaccagca gaagccagga 120
caggcccctg tacttgtcat ctatggtaaa aacaaccggc cctcaggatcccagaccga 180
ttctctggct ccagctcagg aaacacagct tccttgacca tcactgggc tcaggcggaa 240
gatgaggcgt actattactg taagtcccg gacagcagtt ataaccatct ggtattcggc 300
ggagggacca aactgaccgt ccta 324

<210> 196

<211> 108

<212> PRT

<213> Homo sapiens

<400> 196

Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ile Leu Arg Ser Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Val Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Lys Ser Arg Asp Ser Ser Tyr Asn His
85 90 95
Leu Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 197

<211> 366

<212> DNA

<213> Homo sapiens

<400> 197

caggtgcagc tggggagtc tggggaggc gtggtccagc ctgggaggc cctgagactc 60
tcctgtcag cgtctggatt cacctcagt agctatggca tgcactgggt ccggccaggct 120
ccaggcaagg ggctggagtg ggtggcaatt atatggatg atggaaagtaa tgaataactat 180
ggagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgttt 240
ctgcaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagatccc 300
ctccgtatag tagtggctgg ggacttgac tactggggcc agggaaacct ggtcaccgtc 360
tcctca 366

<210> 198

<211> 122

<212> PRT

<213> Homo sapiens

<400> 198

Gln	Val	Gln	Leu	Val	Glu	Ser	Gly	Gly	Gly	Val	Val	Gln	Pro	Gly	Arg
1					5				10				15		
Ser	Leu	Arg	Leu	Ser	Cys	Ala	Ala	Ser	Gly	Phe	Thr	Phe	Ser	Ser	Tyr
					20				25				30		
Gly	Met	His	Trp	Val	Arg	Gln	Ala	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val
					35				40				45		
Ala	Ile	Ile	Trp	Tyr	Asp	Gly	Ser	Asn	Glu	Tyr	Tyr	Gly	Asp	Ser	Val
					50				55				60		
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Phe
					65				70				75		80
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
					85				90				95		
Ala	Arg	Asp	Pro	Leu	Arg	Ile	Val	Val	Ala	Gly	Asp	Phe	Asp	Tyr	Trp
					100				105				110		
Gly	Gln	Gly	Thr	Leu	Val	Thr	Val	Ser	Ser						
					115				120						

<210> 199

<211> 333

<212> DNA

<213> Homo sapiens

<400> 199

cagtctgtc tgacgcagcc gccctcagtg tctggggccc cagggctgag ggtcaccatc 60
tcctgcactg gaaacagctc caacatcggt gcaggttatg atgtacactg gtaccagcag 120
cttccagggaa cagcccccaa actcctcatc tatggtaaca gcaatcggtcc ctcaggggtc 180
cctgaccgt tctctggctc caagtctggc acctcagcct ccctggccat cactgggtc 240
caggctgagg atgagactga ttattactgc cagtcctatg acagcagcct gagtggttcg 300
gtattcggcg gagggaccaa gctgaccgtc cta 333

<210> 200

<211> 111

<212> PRT

<213> Homo sapiens

<400> 200

Gln	Ser	Val	Leu	Thr	Gln	Pro	Pro	Ser	Val	Ser	Gly	Ala	Pro	Gly	Leu
1					5				10				15		
Arg	Val	Thr	Ile	Ser	Cys	Thr	Gly	Asn	Ser	Ser	Asn	Ile	Gly	Ala	Gly
					20				25				30		
Tyr	Asp	Val	His	Trp	Tyr	Gln	Gln	Leu	Pro	Gly	Thr	Ala	Pro	Lys	Leu

35	40	45
Leu Ile Tyr Gly Asn Ser Asn Arg Pro Ser Gly Val Pro Asp Arg Phe		
50	55	60
Ser Gly Ser Lys Ser Gly Thr Ser Ala Ser Leu Ala Ile Thr Gly Leu		
65	70	75
Gln Ala Glu Asp Glu Thr Asp Tyr Tyr Cys Gln Ser Tyr Asp Ser Ser		
85	90	95
Leu Ser Gly Ser Val Phe Gly Gly Thr Lys Leu Thr Val Leu		
100	105	110

<210> 201

<211> 363

<212> DNA

<213> Homo sapiens

<400> 201

caggtgcacc tggggaggc tggggaggc gtgggtccagc ctggggaggc cctgagactc 60
 tcctgtgcag cgtctggatt caccttcgtt agctatggca tgcactgggt ccggccaggct 120
 ccaggcaagg ggctggagggt ggtggcagtt atatggcatg atggaaagtaa taaataactat 180
 gcagactccg tgaaggcccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
 ctgcaaatga acagcctgag agccgaggac acggctgtgtt attactgtac aagagaggggg 300
 gactacggtg gttaccctta ctttactac tggggccagg gaaccctgggt caccgtctcc 360
 tca 363

<210> 202

<211> 121

<212> PRT

<213> Homo sapiens

<400> 202

Gln Val His Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
 20 25 30
 Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ala Val Ile Trp His Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
 65 70 75 80
 Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Thr Arg Glu Gly Asp Tyr Gly Gly Tyr Pro Tyr Phe Asp Tyr Trp Gly
 100 105 110
 Gln Gly Thr Leu Val Thr Val Ser Ser
 115 120

<210> 203

<211> 324

<212> DNA

<213> Homo sapiens

<400> 203

tcttctgagc tgactcagga ccctgctgtg tctgtggct tgggacagac agtcaggatc 60
 acatgccaag gagacatcct cagaagctat tatgcaagct ggtaccagca gaagccagga 120
 caggccctta tacttgtcat ctatggtaaa aacaaccggc cctcaggat cccagaccga 180
 ttctctggct ccagctcagg aaacacagct tccttgacca tcactgggc tcaggcggaa 240

gatgaggctg actattactg taagtcccg gacagcagtt ataaccatct ggtattcggc 300
ggagggacca aactgaccgt ccta 324

<210> 204
<211> 108
<212> PRT
<213> Homo sapiens

<400> 204
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ile Leu Arg Ser Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Ile Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Lys Ser Arg Asp Ser Ser Tyr Asn His
85 90 95
Leu Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 205
<211> 375
<212> DNA
<213> Homo sapiens

<400> 205
caggtgcagc tggtgagtc tggggaggc gtggtccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagt agctatggca tgcactgggt ccgccaggct 120
ccagccaagg ggctggagtg ggtggcagtt atatggtatg atgaaagtaa taaatactat 180
gcagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagact 300
acggtgacta aggaggccta ctactactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct ccta 375

<210> 206
<211> 125
<212> PRT
<213> Homo sapiens

<400> 206
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Thr Thr Val Thr Lys Glu Gly Tyr Tyr Tyr Tyr Gly Met
100 105 110

Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 207

<211> 321

<212> DNA

<213> Homo sapiens

<400> 207

gacatccaga tgacccagtc tccatcttcc ctgtctgcat ctgtaggaga cagagtccacc 60
atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggtac tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 208

<211> 107

<212> PRT

<213> Homo sapiens

<400> 208

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15

Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30

Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45

Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60

Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80

Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95

Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 209

<211> 360

<212> DNA

<213> Homo sapiens

<400> 209

caggtgcagc tggtgagtc tggggaggc gtggtccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagt acctatggca tgcactgggt ccggcaggct 120
ccaggaagg ggctggagtg ggtggcagtt atatggatg atgaaagtaa taaatactat 180
gcagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgctatat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagatcccc 300
tacggtgact ggggtgggtt cgaccctgg gcgcaggaa ccctggcac cgtctccctca 360

<210> 210

<211> 120

<212> PRT

<213> Homo sapiens

<400> 210

Gln	Val	Gln	Leu	Val	Glu	Ser	Gly	Gly	Gly	Val	Val	Gln	Pro	Gly	Arg
1															15
Ser	Leu	Arg	Leu	Ser	Cys	Ala	Ala	Ser	Gly	Phe	Thr	Phe	Ser	Thr	Tyr
															20
Gly	Met	His	Trp	Val	Arg	Gln	Ala	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val
															35
Ala	Val	Ile	Trp	Tyr	Asp	Gly	Ser	Asn	Lys	Tyr	Tyr	Ala	Asp	Ser	Val
															50
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Tyr
															65
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
															85
Ala	Arg	Ser	Arg	Tyr	Gly	Asp	Trp	Gly	Trp	Phe	Asp	Pro	Trp	Gly	Gln
															100
Gly	Thr	Leu	Val	Thr	Val	Ser	Ser								
															115
															120

<210> 211

<211> 330

<212> DNA

<213> Homo sapiens

<400> 211

cagtctgtgc	tgactcagcc	accctcagcg	tctgggaccc	ccgggcagag	ggtcaccatc	60
tcttgttctg	gaagcagctc	caacatcgga	agtaatactg	taaactggta	ccagcagctc	120
ccaggaacgg	cccccaaact	cctcatctat	agtaataatc	agcggccctc	aggggtccct	180
gaccgattct	ctggctccaa	gtctggcacc	tcagcctccc	tggccatca	tgggctccag	240
tctgaggatg	aggctgatta	ttactgtgca	gcatggatg	acagcctgaa	tggtccggtg	300
ttcggcggag	ggaccaagct	gaccgtccta				330

<210> 212

<211> 110

<212> PRT

<213> Homo sapiens

<400> 212

Gln	Ser	Val	Leu	Thr	Gln	Pro	Pro	Ser	Ala	Ser	Gly	Thr	Pro	Gly	Gln
1															15
Arg	Val	Thr	Ile	Ser	Cys	Ser	Ser	Ser	Asn	Ile	Gly	Ser	Asn		
															20
Thr	Val	Asn	Trp	Tyr	Gln	Gln	Leu	Pro	Gly	Thr	Ala	Pro	Lys	Leu	Leu
															35
Ile	Tyr	Ser	Asn	Asn	Gln	Arg	Pro	Ser	Gly	Val	Pro	Asp	Arg	Phe	Ser
															50
Gly	Ser	Lys	Ser	Gly	Thr	Ser	Ala	Ser	Leu	Ala	Ile	Ser	Gly	Leu	Gln
															65
Ser	Glu	Asp	Glu	Ala	Asp	Tyr	Tyr	Cys	Ala	Ala	Trp	Asp	Asp	Ser	Leu
															85
Asn	Gly	Pro	Val	Phe	Gly	Gly	Gly	Thr	Lys	Leu	Thr	Val	Leu		
															100
															105
															110

<210> 213

<211> 366

<212> DNA

<213> Homo sapiens

<400> 213

i
caggtgcagc tggggagtc tggggaggc gtggccagc ctggggagtc cctgagactc 60
tcctgtgcag cgtctggatt caccttcgtt agctatggca tgcactgggt ccggccaggct 120
ccaggcaagg ggctggagtg ggtggcaatt atatggatg atggaaagtaa tgaataactat 180
ggagactccg tgaaggggccg attcaccatc tccagagaca attccaagaa cacgctgttt 240
ctgcaatga acagccttag agccgaggac acggctgtgt attactgtgc gagagatccc 300
ctccgtatag tagtggctgg ggactttgac tactggggcc agggaaacctt ggtcaccgtc 360
tcctca 366

<210> 214
<211> 122
<212> PRT
<213> Homo sapiens

<400> 214
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Ile Ile Trp Tyr Asp Gly Ser Asn Glu Tyr Tyr Gly Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Phe
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Asp Pro Leu Arg Ile Val Val Ala Gly Asp Phe Asp Tyr Trp
100 105 110
Gly Gln Gly Thr Leu Val Thr Val Ser Ser
115 120

<210> 215
<211> 321
<212> DNA
<213> Homo sapiens

<400> 215
gaaaatgtga tgacgcagtc tccagccacc ctgtctgtgt ctccaggggaa aagagccacc 60
ctctcctgca gggccagtca gagtgttatac agcaacttag cctggatcca gcagcaacct 120
ggccaggctc ccaggctctt catctatggt gcatccacca gggccactgg tttcccgagcc 180
aggttcagtg gcagtgggtc tgggacagag ttcaactctca ccatcagcag cctgcagtt 240
gaagattttt cagtttattt ctgtcagcag tataataact ggcgcgtcac tttcggcgaa 300
gggaccaagg tggagatcaa a 321

<210> 216
<211> 107
<212> PRT
<213> Homo sapiens

<400> 216
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ile Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Gln Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
Tyr Gly Ala Ser Thr Arg Ala Thr Gly Phe Pro Ala Arg Phe Ser Gly
50 55 60

Ser	Gly	Ser	Gly	Thr	Glu	Phe	Thr	Leu	Thr	Ile	Ser	Ser	Leu	Gln	Ser
65				70					75					80	
Glu	Asp	Phe	Ala	Val	Tyr	Tyr	Cys	Gln	Gln	Tyr	Asn	Asn	Trp	Pro	Leu
				85				90					95		
Thr	Phe	Gly	Gly	Gly	Thr	Lys	Val	Glu	Ile	Lys					
				100			105								

<210> 217
<211> 375
<212> DNA
<213> Homo sapiens

<400> 217
caggtgcagc tgggtggagtc tgggggaggc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcgt agctatggca tgcaactgggt ccggccaggct 120
ccaggcaagg ggctggagtg ggtggcagtt atatggtatg atggaaagttaa taaatactat 180
gcagactccg tgaaggggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagccttag agccgaggac acggctgtgtt attactgtgc gagagagact 300
acggtgacta aggagggcta ctactactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 218
<211> 125
<212> PRT
<213> Homo sapiens

<400> 218
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Thr Thr Val Thr Lys Glu Gly Tyr Tyr Tyr Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 219
<211> 321
<212> DNA
<213> Homo sapiens

<400> 219
gacatccaga tgacccagtc tccatcttcc ctgtctgcat ctgtaggaga cagagtccacc 60
atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
agtttcagcg gcagtgatc tgggacagaa ttcaactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgg 300
gggaccaagg tggagatcaa a 321

<210> 220
<211> 107
<212> PRT
<213> Homo sapiens

<400> 220
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 221
<211> 375
<212> DNA
<213> Homo sapiens

<400> 221
cagggtgcagc tgggtggagtc tgggggaggc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtgcag cctctggatt caccttcagt agctatgaca tgcacttggt ccggccaggct 120
ccagggcaagg ggctggagtg ggtggcaatt atatcatatg atggaaagtat taaatactat 180
gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agctgaggac acggctgtgt attactgtgc gagagagaat 300
gcgggtgactt acgggggcta ctaccactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 222
<211> 125
<212> PRT
<213> Homo sapiens

<400> 222
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Asp Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Ile Ile Ser Tyr Asp Gly Ser Ile Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Asn Ala Val Thr Tyr Gly Gly Tyr Tyr His Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 223
<211> 321
<212> DNA
<213> Homo sapiens

<400> 223
gacatccaga tgacccagtc tccatccctcc ctgtctacat ctgttaggaga cagagtcacc 60
atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggtac tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 224
<211> 107
<212> PRT
<213> Homo sapiens

<400> 224
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Thr Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 225
<211> 375
<212> DNA
<213> Homo sapiens

<400> 225
caggtgcagc tgggtggagtc tgggggaggc gtggtccagc ctgggaggc cctgagactc 60
tcctgtacaa catctggatt caccttcagt aactatggca tgcactgggt ccggcaggct 120
ccaggaagg ggctggagtg ggtggcagtt atctggatg atggaaagtat taaatactat 180
gtagactccg tgaaggcccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaatga acagccttag agccgaggac acggctgtgt attactgtgc gagagagaag 300
gattgtggtg gtgactgtta cagccactac ggtatggac tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 226
<211> 125
<212> PRT
<213> Homo sapiens

<400> 226
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Thr Thr Ser Gly Phe Thr Phe Ser Asn Tyr

	20	25	30												
Gly	Met	His	Trp	Val	Arg	Gln	Ala	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val
			35		40					45					
Ala	Val	Ile	Trp	Tyr	Asp	Gly	Ser	Ile	Lys	Tyr	Tyr	Val	Asp	Ser	Val
			50		55					60					
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Tyr
			65		70				75			80			
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
			85		90				95						
Ala	Arg	Glu	Lys	Asp	Cys	Gly	Gly	Asp	Cys	Tyr	Ser	His	Tyr	Gly	Met
			100		105						110				
Asp	Val	Trp	Gly	Gln	Gly	Thr	Thr	Val	Thr	Val	Ser	Ser			
			115		120						125				

<210> 227

<211> 321

<212> DNA

<213> Homo sapiens

<400> 227

gacatccaga tgacccagtc tccatccctcc ctgtctgcat ctgttaggaga cagagtccacc 60
 atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaaacca 120
 gggaaagccc ctaagcgcct gatctatgct gcatccagg ttgcaaagtgg ggtcccatca 180
 aggttcagcg gcagtggtatc tgggacagaa ttcactctca caatcagcag cctgcagcct 240
 gaagattttg caacgttatta ctgtctacag catatgagtc tcccgctcac tttcggcgga 300
 gggaccaagg tggagatcaa a 321

<210> 228

<211> 107

<212> PRT

<213> Homo sapiens

<400> 228

	1	5	10	15											
Asp	Ile	Gln	Met	Thr	Gln	Ser	Pro	Ser	Ser	Leu	Ser	Ala	Ser	Val	Gly
				20		25				30					
Leu	Gly	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Lys	Ala	Pro	Lys	Arg	Leu	Ile
				35		40			45						
Tyr	Ala	Ala	Ser	Ser	Leu	Gln	Ser	Gly	Val	Pro	Ser	Arg	Phe	Ser	Gly
				50		55			60						
Ser	Gly	Ser	Gly	Thr	Glu	Phe	Thr	Leu	Thr	Ile	Ser	Ser	Leu	Gln	Pro
				65		70			75			80			
Glu	Asp	Phe	Ala	Thr	Tyr	Tyr	Cys	Leu	Gln	His	Met	Ser	Leu	Pro	Leu
				85		90			95						
Thr	Phe	Gly	Gly	Gly	Thr	Lys	Val	Glu	Ile	Lys					
				100		105									

<210> 229

<211> 375

<212> DNA

<213> Homo sapiens

<400> 229

caggtgcagc tgggtggagtc tgggggaggc gtgggtccagc ctggggaggc cctgagactc 60
 tcctgtacaa catctggatt caccttcagt aactatggca tgcactgggt ccgccaggct 120
 ccaggcaagg ggctggagtg ggtggcagtt atctggatg atgaaagtat taaatactat 180

gtagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagaag 300
gattgtggtg gtgactgtta cagccactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 230
<211> 125
<212> PRT
<213> Homo sapiens

<400> 230
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Thr Thr Ser Gly Phe Thr Phe Ser Asn Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Ile Lys Tyr Tyr Val Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Lys Asp Cys Gly Gly Asp Cys Tyr Ser His Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 231
<211> 321
<212> DNA
<213> Homo sapiens

<400> 231
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgtaggaga cagagtccacc 60
atcacttgcg gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggtatc tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacgttatta ctgtctacag catatgagtc tcccgctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 232
<211> 107
<212> PRT
<213> Homo sapiens

<400> 232
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Met Ser Leu Pro Leu

85 90 95
Thr Phe Gly Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 233
<211> 375
<212> DNA
<213> Homo sapiens

<400> 233
caggtgcagc tgggtggagtc tgggggaggc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtacaa catctggatt caccttcagt aactatggca tgcaactgggt ccggccaggct 120
ccagggcaagg ggctggagtg ggtggcagtt atctggatg atggaaagtat taaatactat 180
gtagactccg tgaaggggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagagaag 300
gattgtggtg gtgactgtta cagccactac ggtatggacg tctggggcca agggaccacg 360
gtcaccgtct cctca 375

<210> 234
<211> 125
<212> PRT
<213> Homo sapiens

<400> 234
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Thr Thr Ser Gly Phe Thr Phe Ser Asn Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Ile Lys Tyr Tyr Val Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Glu Lys Asp Cys Gly Gly Asp Cys Tyr Ser His Tyr Gly Met
100 105 110
Asp Val Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120 125

<210> 235
<211> 321
<212> DNA
<213> Homo sapiens

<400> 235
gacatccaga tgacccagtc tccatccctcc ctgtctgcat ctgtaggaga cagagtccacc 60
atcaattgcc gggcaagtca gggcattaga aatgatttag gctggatca gcagaaaacca 120
gggaaagccc ctaagcgcct gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
agtttcagcg gcagtggatc tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacgttatta ctgtctacag catatgagtc tcccgcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 236
<211> 107
<212> PRT

<213> Homo sapiens

<400> 236

Asp	Ile	Gln	Met	Thr	Gln	Ser	Pro	Ser	Ser	Leu	Ser	Ala	Ser	Val	Gly
1		5				10						15			
Asp	Arg	Val	Thr	Ile	Thr	Cys	Arg	Ala	Ser	Gln	Gly	Ile	Arg	Asn	Asp
	20					25						30			
Leu	Gly	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Lys	Ala	Pro	Lys	Arg	Leu	Ile
	35					40						45			
Tyr	Ala	Ala	Ser	Ser	Leu	Gln	Ser	Gly	Val	Pro	Ser	Arg	Phe	Ser	Gly
	50					55						60			
Ser	Gly	Ser	Gly	Thr	Glu	Phe	Thr	Leu	Thr	Ile	Ser	Ser	Leu	Gln	Pro
65				70					75					80	
Glu	Asp	Phe	Ala	Thr	Tyr	Tyr	Cys	Leu	Gln	His	Met	Ser	Leu	Pro	Leu
		85					90						95		
Thr	Phe	Gly	Gly	Gly	Thr	Lys	Val	Glu	Ile	Lys					
		100					105								

<210> 237

<211> 375

<212> DNA

<213> Homo sapiens

<400> 237

cagg	tggt	ggagtc	tggggg	aggc	gtgg	tcc	ctgg	ggagtc	cctg	gagactc	60
tc	cgt	tacaa	cat	ctgg	att	cac	ctt	cagt	aact	atgg	60
cc	agg	caagg	gg	ctgg	gagt	gt	ggc	agtt	atct	ggat	120
gt	act	ccg	tga	agg	ccg	att	cacc	atc	tcc	agaga	180
ctg	caat	gtg	ac	gc	cct	tg	gagg	ac	gg	cgt	240
gatt	tggt	gt	tgact	gtt	ta	cgg	act	tg	ttc	at	300
gtc	acc	gtc	act	ac	act	ac	gg	at	gg	gt	360
											375

<210> 238

<211> 125

<212> PRT

<213> Homo sapiens

<400> 238

Gln	Val	Gln	Leu	Val	Glu	Ser	Gly	Gly	Val	Val	Gln	Pro	Gly	Arg	
1		5			10						15				
Ser	Leu	Arg	Leu	Ser	Cys	Thr	Thr	Ser	Gly	Phe	Thr	Phe	Ser	Asn	Tyr
	20					25					30				
Gly	Met	His	Trp	Val	Arg	Gln	Ala	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val
	35					40					45				
Ala	Val	Ile	Trp	Tyr	Asp	Gly	Ser	Ile	Lys	Tyr	Tyr	Val	Asp	Ser	Val
	50					55					60				
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Tyr
65					70				75				80		
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
		85				90						95			
Ala	Arg	Glu	Lys	Asp	Cys	Gly	Gly	Asp	Cys	Tyr	Ser	His	Tyr	Gly	Met
		100				105						110			
Asp	Val	Trp	Gly	Gln	Gly	Thr	Thr	Val	Thr	Val	Ser	Ser			
	115					120						125			

<210> 239

<211> 321

<212> DNA

<213> Homo sapiens

<400> 239

gacatccaga tgacccagtc tccatccctcc ctgtctgcat ctgttaggaga cagagtcacc 60
atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagcgctt gatctatgct gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggtac tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacgtattt ctgtctacag catatgagtc tcccgctcac ttccggcgga 300
gggaccaagg tggagatcaa a 321

<210> 240

<211> 107

<212> PRT

<213> Homo sapiens

<400> 240

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Met Ser Leu Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 241

<211> 366

<212> DNA

<213> Homo sapiens

<400> 241

caggtgcagc tggggaggc gtggtccagc ctgggaggc cctgagactc 60
tcctgtgcag cgtctggatt cacccgcagc agctatggca tgcaactgggt ccggcaggct 120
ccaggcaagg gcgtggagt ggtgcagtt atatggatg atggaaagaaa taaatacaat 180
gcagactccg tgaaggccg attcaccatc tccagagaca attccaagaa cacgctgaat 240
ctgcaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagattta 300
acgtattacg atatttggg cggtatggac gtctgggccc aagggaccac ggtcaccgtc 360
tcctca 366

<210> 242

<211> 122

<212> PRT

<213> Homo sapiens

<400> 242

Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45

Ala Val Ile Trp Tyr Asp Gly Arg Asn Lys Tyr Asn Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Asn
 65 70 75 80
 Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Arg Asp Leu Thr Tyr Tyr Asp Ile Leu Gly Gly Met Asp Val Trp
 100 105 110
 Gly Gln Gly Thr Thr Val Thr Val Ser Ser
 115 120

<210> 243

<211> 321

<212> DNA

<213> Homo sapiens

<400> 243

gaaatagtga tgacgcagtc tccagccacc ctgtctgtgt ctccggggga aagagccacc 60
 ctctcctgca gggccagtcgagtttacc agcaacttag cctggatcca gcagaaacct 120
 ggcgcaggctc ccaggctct catctatggt gcatccacca gggccactgg tatcccagcc 180
 aggttcagtg gcagtgggtc tgggacagaa ttcactctca ccatcagcag cctggcgct 240
 gaagattttg cagtttatta ctgtcagcag tatacactt ggcatttcac tttcggccct 300
 gggaccaaag tggatataa a 321

<210> 244

<211> 107

<212> PRT

<213> Homo sapiens

<400> 244

Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
 1 5 10 15
 Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Thr Ser Asn
 20 25 30
 Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
 35 40 45
 Tyr Gly Ala Ser Thr Arg Ala Thr Gly Ile Pro Ala Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Pro Ser
 65 70 75 80
 Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr His Thr Trp Pro Phe
 85 90 95
 Thr Phe Gly Pro Gly Thr Lys Val Asp Ile Lys
 100 105

<210> 245

<211> 366

<212> DNA

<213> Homo sapiens

<400> 245

caggtgcagc tggggaggc tggggaggc gtggtccagc ctgggaggc cctgagactc 60
 tcctgtgcag cgtctggatt cacccatcagc agctatggca tgcactgggt ccggcaggct 120
 ccaggcaagg gcgtggaggc ggtgcagtt atatggatg atggaaagaaa taaatacaat 180
 gcagactccg tgaaggcccg attcaccatc tccagagaca attccaagaa cacgctgaat 240
 ctgcaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagattta 300
 acgttattacg atattttggc cggtatggac gtctgggccc aaggaccac ggtcaccgtc 360

tcctca

366

<210> 246

<211> 122

<212> PRT

<213> Homo sapiens

<400> 246

Gln Val Gln Leu Val Glu Ser Gly Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Arg Asn Lys Tyr Asn Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Asn
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Asp Leu Thr Tyr Tyr Asp Ile Leu Gly Gly Met Asp Val Trp
100 105 110
Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

<210> 247

<211> 321

<212> DNA

<213> Homo sapiens

<400> 247

gaaatagtga tgacgcagtc tccatccacc ctgtctgtgt ctccggggga aagagccacc 60
ctctcctgca gggccagtca gagtgttacc agcaacttag cctggtagca gcagaaaacct 120
ggccaggctc ccaggctct catctatggt gcatccacca gggccactgg tatcccagcc 180
aggttcagtg gcagtggtc tgggacagaa ttcaactctca ccatcagcag cctgcccgtct 240
gaagattttg cagtttatta ctgtcagcag tatcataacct ggccattcac tttcggccct 300
gggaccaaag tggatatcaa a 321

<210> 248

<211> 107

<212> PRT

<213> Homo sapiens

<400> 248

Glu Ile Val Met Thr Gln Ser Pro Ser Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Thr Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45
Tyr Gly Ala Ser Thr Arg Ala Thr Gly Ile Pro Ala Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Pro Ser
65 70 75 80
Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr His Thr Trp Pro Phe
85 90 95
Thr Phe Gly Pro Gly Thr Lys Val Asp Ile Lys
100 105

<210> 249
<211> 366
<212> DNA
<213> Homo sapiens

<400> 249
caggtgcagc tgggtggagtc tgggggaggc gtgggtccagc ctggggaggc cctgagactc 60
tcctgtgcag cgtctggatt caccttcagc agctatggca tgcactgggt ccggccaggct 120
ccagggcaagg ggctggagtg ggtggcagtt atatggatg atgaaagaaa taaatacaat 180
gcagactccg tgaaggggccg attcaccatc tccagagaca attccaagaa cacgctgaat 240
ctgcaaatga acagcctgag agccgaggac acggctgtgt attactgtgc gagagattta 300
acgtattacg atattttggg cggtatggac gtctggggcc aagggaccac ggtcacccgtc 360
tcctca 366

<210> 250
<211> 122
<212> PRT
<213> Homo sapiens

<400> 250
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Arg Asn Lys Tyr Asn Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Asn
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Asp Leu Thr Tyr Tyr Asp Ile Leu Gly Gly Met Asp Val Trp
100 105 110
Gly Gln Gly Thr Thr Val Thr Val Ser Ser
115 120

<210> 251
<211> 321
<212> DNA
<213> Homo sapiens

<400> 251
gacatccaga tgacctcagtc tccatccctcc ctgtctgcat ctgtaggaga cagagtccacc 60
atcaattgcc gggcaagtca gggcattaga catgatttag gctggtatca gcagaaacca 120
gggaaagccc ctgagcgcct gatctatggt gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggatc tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgga 300
gggaccaagg tggagatcaa a 321

<210> 252
<211> 107
<212> PRT
<213> Homo sapiens

<400> 252

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
 1 5 10 15
 Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg His Asp
 20 25 30
 Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Glu Arg Leu Ile
 35 40 45
 Tyr Gly Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
 65 70 75 80
 Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
 85 90 95
 Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
 100 105

<210> 253

<211> 402

<212> DNA

<213> Homo sapiens

<400> 253

caggtgcagc tgggtggagtc tgggggaggc gtgggtccagc ctggggaggc cctgagactc 60
 tcctgtgcag cgtctggatt caccttcagt agctatggca tgcactgggt ccggccaggct 120
 ccagggcaagg ggctggagtg ggtggcagtg atatggatg atggaaagtaa taaataactat 180
 gcagactccg tgaagggccg attcaccatc tccagagaca attccaagaa cacgctgtat 240
 ctgcaaatga acagccttag agccgaggac acggctgtgt attactgtgc gagaggttaat 300
 cgcgttagtag tggctggtag gagggtaact cccgctaact ggggatacta ctattacgga 360
 atggacgtct gggccaagg gaccacggc accgtctcc 402
 ca

<210> 254

<211> 134

<212> PRT

<213> Homo sapiens

<400> 254

Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
 20 25 30
 Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
 65 70 75 80
 Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Arg Gly Asn Arg Val Val Val Ala Gly Thr Arg Val Thr Pro Ala
 100 105 110
 Asn Trp Gly Tyr Tyr Tyr Gly Met Asp Val Trp Gly Gln Gly Thr
 115 120 125
 Thr Val Thr Val Ser Ser
 130

<210> 255

<211> 321

<212> DNA

<213> Homo sapiens

<400> 255

gacatccaga tgacccagtc tccatccctcc ctgtctgcat ctgttaggaga cagagtccacc 60
atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaacca 120
gggaaagccc ctaagtgcct gatctatgtt gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggtac tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt acccgctcac tttcggcgg 300
gggaccaagg tggagatcaa a 321

<210> 256

<211> 107

<212> PRT

<213> Homo sapiens

<400> 256

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Cys Leu Ile
35 40 45
Tyr Val Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 257

<211> 348

<212> DNA

<213> Homo sapiens

<400> 257

gaggtgcaac tgggggagtc tgggtacagc ctggggggtc cctgagactc 60
tcctgtgcag cctctggatt caccttcagt aattatggca tgaactgggt ccggcaggct 120
ccagggaaagg ggctggagtg ggttcatac ataagtaata gtattacttc caaataactac 180
gctgactctg tgaaggccg attcaccatc tccagagaca atgccaagaa ttcaactgtat 240
ctgcaatga acagcctgag agacgtggac acggctgtgt atcaactgtgc gagaggaccg 300
ggcggttttgc actactgggg ccagggacc ctggtcaccgc tctccatca 348

<210> 258

<211> 116

<212> PRT

<213> Homo sapiens

<400> 258

Glu Val Gln Leu Val Glu Ser Gly Gly Leu Val Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asn Tyr
20 25 30
Gly Met Asn Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Tyr Ile Ser Asn Ser Ile Thr Ser Lys Tyr Tyr Ala Asp Ser Val
50 55 60

Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn Ser Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Asp Val Asp Thr Ala Val Tyr His Cys
85 90 95
Ala Arg Gly Pro Gly Gly Phe Asp Tyr Trp Gly Gln Gly Thr Leu Val
100 105 110
Thr Val Ser Ser
115

<210> 259
<211> 321
<212> DNA
<213> Homo sapiens

<400> 259
gacatccaga tgacccagtc tccatccctcc ctgtctgcat ctgtaggaga cagagtcacc 60
atcacttgcc gggcaagtca gggcattaga aatgatttag gctggtatca gcagaaaacca 120
gggaaagccc cgaagtgcct gatctatgtt gcatccagtt tgcaaagtgg ggtcccatca 180
aggttcagcg gcagtggtac tgggacagaa ttcactctca caatcagcag cctgcagcct 240
gaagattttg caacttatta ctgtctacag cataatagtt acccgtggac gttcggccaa 300
gggaccaagg tggaaatcaa a 321

<210> 260
<211> 107
<212> PRT
<213> Homo sapiens

<400> 260
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Cys Leu Ile
35 40 45
Tyr Val Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Trp
85 90 95
Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105

<210> 261
<211> 366
<212> DNA
<213> Homo sapiens

<400> 261
gaggtgcagc tggggggggc ttggtagc cggggggggc cctgagactc 60
tcctgtgcag cctctggatt caccttagc agctatgcca tggctgggt cccggcaggct 120
ccagggaaagg ggctggatgt ggtctcagct attagtggtt gttgggttag cacataactac 180
gcagactccg tgaaggcccg gttcaccatc tccagagaca attccaagaa cacgctgtat 240
ctgcaaatga acagccttag agccgaggac acggccgtat attactgtgc gaaagattac 300
tatgatagta gtggttatca tcctttgac tactggggcc agggaaacct ggtcaccgtc 360
tcctca 366

<210> 262
<211> 122
<212> PRT
<213> Homo sapiens

<400> 262
Glu Val Gln Leu Leu Glu Ser Gly Gly Gly Leu Val Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Ala Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Ala Ile Ser Gly Ser Gly Ser Thr Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Lys Asp Tyr Tyr Asp Ser Ser Gly Tyr His Pro Phe Asp Tyr Trp
100 105 110
Gly Gln Gly Thr Leu Val Thr Val Ser Ser
115 120

<210> 263
<211> 321
<212> DNA
<213> Homo sapiens

<400> 263
gacatccaga tgacccagtc tccatcctcc ctgtctgcat ctgtaggaga cagagtcacc 60
atcaattgcc gggcgagtca gggcattagc aattatttag cctggtatca acagaaacca 120
gggaaagtcc ctaagttcct gatctatgct gcatccactt tgcaatcagg ggtcccatct 180
cggttcagtg gcagtgggatc tgggacagat ttcactctca ccgtcagcag cctgcagcct 240
gaagatgttg caacttatta ctgtcaaatg tataacagtg tcccattcac tttcggccct 300
gggaccaaag tggatatcaa a 321

<210> 264
<211> 107
<212> PRT
<213> Homo sapiens

<400> 264
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Ser Asn Tyr
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Lys Val Pro Lys Phe Leu Ile
35 40 45
Tyr Ala Ala Ser Thr Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Val Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Val Ala Thr Tyr Tyr Cys Gln Met Tyr Asn Ser Val Pro Phe
85 90 95
Thr Phe Gly Pro Gly Thr Lys Val Asp Ile Lys
100 105

<210> 265
<211> 157
<212> PRT
<213> homo sapiens

<400> 265

Val	Arg	Ser	Ser	Ser	Arg	Thr	Pro	Ser	Asp	Lys	Pro	Val	Ala	His	Val
1				5					10					15	
Val	Ala	Asn	Pro	Gln	Ala	Glu	Gly	Gln	Leu	Gln	Trp	Leu	Asn	Arg	Arg
				20				25						30	
Ala	Asn	Ala	Leu	Leu	Ala	Asn	Gly	Val	Glu	Leu	Arg	Asp	Asn	Gln	Leu
				35				40					45		
Val	Val	Pro	Ser	Glu	Gly	Leu	Tyr	Leu	Ile	Tyr	Ser	Gln	Val	Leu	Phe
				50			55						60		
Lys	Gly	Gln	Gly	Cys	Pro	Ser	Thr	His	Val	Leu	Leu	Thr	His	Thr	Ile
65					70				75					80	
Ser	Arg	Ile	Ala	Val	Ser	Tyr	Gln	Thr	Lys	Val	Asn	Leu	Leu	Ser	Ala
				85				90					95		
Ile	Lys	Ser	Pro	Cys	Gln	Arg	Glu	Thr	Pro	Glu	Gly	Ala	Glu	Ala	Lys
				100			105					110			
Pro	Trp	Tyr	Glu	Pro	Ile	Tyr	Leu	Gly	Gly	Val	Phe	Gln	Leu	Glu	Lys
				115			120					125			
Gly	Asp	Arg	Leu	Ser	Ala	Glu	Ile	Asn	Arg	Pro	Asp	Tyr	Leu	Asp	Phe
				130			135				140				
Ala	Glu	Ser	Gly	Gln	Val	Tyr	Phe	Gly	Ile	Ile	Ala	Leu			
145					150				155						

<210> 266
<211> 156
<212> PRT
<213> Mus musculus

<400> 266

Leu	Arg	Ser	Ser	Gln	Asn	Ser	Ser	Asp	Lys	Pro	Val	Ala	His	Val	
1				5				10					15		
Val	Ala	Asn	His	Gln	Val	Glu	Glu	Gln	Leu	Glu	Trp	Leu	Ser	Gln	Arg
				20			25						30		
Ala	Asn	Ala	Leu	Leu	Ala	Asn	Gly	Met	Asp	Leu	Lys	Asp	Asn	Gln	Leu
				35			40				45				
Val	Val	Pro	Ala	Asp	Gly	Leu	Tyr	Leu	Val	Tyr	Ser	Gln	Val	Leu	Phe
				50			55				60				
Lys	Gly	Gln	Gly	Cys	Pro	Asp	Tyr	Val	Leu	Leu	Thr	His	Thr	Val	Ser
65					70			75					80		
Arg	Phe	Ala	Ile	Ser	Tyr	Gln	Glu	Lys	Val	Asn	Leu	Leu	Ser	Ala	Val
				85			90				95				
Lys	Ser	Pro	Cys	Pro	Lys	Asp	Thr	Pro	Glu	Gly	Ala	Glu	Leu	Lys	Pro
				100			105				110				
Trp	Tyr	Glu	Pro	Ile	Tyr	Leu	Gly	Gly	Val	Phe	Gln	Leu	Glu	Lys	Gly
				115			120				125				
Asp	Gln	Leu	Ser	Ala	Glu	Val	Asn	Leu	Pro	Lys	Tyr	Leu	Asp	Phe	Ala
				130			135				140				
Glu	Ser	Gly	Gln	Val	Tyr	Phe	Gly	Val	Ile	Ala	Leu				
145					150			155							

<210> 267
<211> 109
<212> PRT

<213> Homo sapiens

<400> 267

Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 268

<211> 108

<212> PRT

<213> Homo sapiens

<400> 268

Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Gly Ser Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 269

<211> 109

<212> PRT

<213> Homo sapiens

<400> 269

Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95

Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 270
<211> 109
<212> PRT
<213> Homo sapiens

<400> 270
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Ser Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 271
<211> 108
<212> PRT
<213> Homo sapiens

<400> 271
Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Glu
1 5 10 15
Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Tyr
20 25 30
Tyr Trp Ser Trp Ile Arg Gln Pro Ala Gly Lys Gly Leu Glu Trp Ile
35 40 45
Gly Arg Ile Tyr Thr Ser Gly Ser Thr Asn Tyr Asn Pro Ser Leu Lys
50 55 60
Ser Arg Val Thr Met Ser Val Asp Thr Ser Lys Asn Gln Phe Ser Leu
65 70 75 80
Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Trp Gly Arg Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 272
<211> 110
<212> PRT
<213> Homo sapiens

<400> 272
Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Gln
1 5 10 15
Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Gly
20 25 30
Gly Tyr Tyr Trp Ser Trp Ile Arg Gln His Pro Gly Lys Gly Leu Glu

35	40	45
Trp Ile Gly Tyr Ile Tyr Tyr Ser Gly Ser Thr Tyr Tyr Asn Pro Ser		
50	55	60
Leu Lys Ser Arg Val Thr Ile Ser Val Asp Thr Ser Lys Asn Gln Phe		
65	70	75
Ser Leu Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr		80
85	90	95
Cys Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser		
100	105	110

<210> 273
<211> 107
<212> PRT
<213> *Homo sapiens*

<400> 273
 Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
 1 5 10 15
 Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
 20 25 30
 Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
 35 40 45
 Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
 65 70 75 80
 Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
 85 90 95
 Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
 100 105

<210> 274
<211> 107
<212> PRT
<213> *Homo sapiens*

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<400> 274
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
      1          5          10          15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
      20         25         30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
      35         40         45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
      50         55         60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
      65         70         75         80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Trp
      85         90         95
Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
      100        105

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<210> 275
<211> 114
<212> PRT
<213> *Homo sapiens*

<220>
<221> VARIANT
<222> 101, 102
<223> Xaa = Any Amino Acid

<400> 275
Asp Val Val Met Thr Gln Ser Pro Leu Ser Leu Pro Val Thr Leu Gly
1 5 10 15
Gln Pro Ala Ser Ile Ser Cys Arg Ser Ser Gln Ser Leu Val Tyr Ser
20 25 30
Asp Gly Asn Thr Tyr Leu Asn Trp Phe Gln Gln Arg Pro Gly Gln Ser
35 40 45
Pro Arg Arg Leu Ile Tyr Lys Val Trp Asn Trp Asp Ser Gly Val Pro
50 55 60
Asp Arg Phe Ser Gly Ser Gly Ser Gly Thr Asp Phe Thr Leu Lys Ile
65 70 75 80
Ser Arg Val Glu Ala Glu Asp Val Gly Val Tyr Tyr Cys Met Gln Gly
85 90 95
Thr His Trp Pro Xaa Xaa Leu Thr Phe Gly Gly Gly Thr Lys Val Glu
100 105 110
Ile Lys

<210> 276
<211> 111
<212> PRT
<213> Homo sapiens

<400> 276
Asp Ile Val Met Thr Gln Ser Pro Leu Ser Leu Pro Val Thr Pro Gly
1 5 10 15
Glu Pro Ala Ser Ile Ser Cys Arg Ser Ser Gln Ser Leu Leu His Ser
20 25 30
Asn Gly Tyr Asn Tyr Leu Asp Trp Tyr Leu Gln Lys Pro Gly Gln Ser
35 40 45
Pro Gln Leu Leu Ile Tyr Leu Gly Ser Asn Arg Ala Ser Gly Val Pro
50 55 60
Asp Arg Phe Ser Gly Ser Gly Ser Gly Thr Asp Phe Thr Leu Lys Ile
65 70 75 80
Ser Arg Val Glu Ala Glu Asp Val Gly Val Tyr Tyr Cys Met Gln Ala
85 90 95
Leu Gln Thr Trp Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105 110

<210> 277
<211> 106
<212> PRT
<213> Homo sapiens

<400> 277
Glu Ile Val Met Thr Gln Ser Pro Ala Thr Leu Ser Val Ser Pro Gly
1 5 10 15
Glu Arg Ala Thr Leu Ser Cys Arg Ala Ser Gln Ser Val Ser Ser Asn
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Arg Leu Leu Ile
35 40 45

Tyr Gly Ala Ser Thr Arg Ala Thr Gly Ile Pro Ala Arg Phe Ser Gly
 50 55 60
 Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Ser
 65 70 75 80
 Glu Asp Phe Ala Val Tyr Tyr Cys Gln Gln Tyr Asn Asn Trp Trp Thr
 85 90 95
 Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
 100 105

<210> 278
 <211> 109
 <212> PRT
 <213> Homo sapiens

<400> 278
 Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
 20 25 30
 Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
 65 70 75 80
 Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
 100 105

<210> 279
 <211> 109
 <212> PRT
 <213> Homo sapiens

<400> 279
 Glu Val Gln Leu Leu Glu Ser Gly Gly Leu Val Gln Pro Gly Gly
 1 5 10 15
 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
 20 25 30
 Ala Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
 35 40 45
 Ser Ala Ile Ser Gly Ser Gly Ser Thr Tyr Tyr Ala Asp Ser Val
 50 55 60
 Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
 65 70 75 80
 Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
 85 90 95
 Ala Lys Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
 100 105

<210> 280
 <211> 109
 <212> PRT
 <213> Homo sapiens

<220>

<221> VARIANT

<222> 98

<223> Xaa = Any Amino Acid

<400> 280

Glu	Val	Gln	Leu	Val	Glu	Ser	Gly	Gly	Gly	Leu	Val	Lys	Pro	Gly	Gly
1					5			10				15			
Ser	Leu	Arg	Leu	Ser	Cys	Ala	Ala	Ser	Gly	Phe	Thr	Phe	Ser	Ser	Tyr
					20			25				30			
Ser	Met	Asn	Trp	Val	Arg	Gln	Ala	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val
					35			40			45				
Ser	Ser	Ile	Ser	Ser	Ser	Ser	Tyr	Ile	Tyr	Tyr	Ala	Asp	Ser	Val	
					50			55			60				
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ala	Lys	Asn	Ser	Leu	Tyr
					65			70			75			80	
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
					85			90			95				
Ala	Xaa	Trp	Gly	Gln	Gly	Thr	Thr	Val	Thr	Val	Ser	Ser			
					100			105							

<210> 281

<211> 109

<212> PRT

<213> Homo sapiens

<400> 281

Gln	Val	Gln	Leu	Val	Glu	Ser	Gly	Gly	Gly	Val	Val	Gln	Pro	Gly	Arg
1					5			10				15			
Ser	Leu	Arg	Leu	Ser	Cys	Ala	Ala	Ser	Gly	Phe	Thr	Phe	Ser	Ser	Tyr
					20			25				30			
Gly	Met	His	Trp	Val	Arg	Gln	Ala	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val
					35			40			45				
Ala	Val	Ile	Trp	Tyr	Asp	Gly	Ser	Asn	Lys	Tyr	Tyr	Ala	Asp	Ser	Val
					50			55			60				
Lys	Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Tyr
					65			70			75			80	
Leu	Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
					85			90			95				
Ala	Arg	Trp	Gly	Gln	Gly	Thr	Leu	Val	Thr	Val	Ser	Ser			
					100			105							

<210> 282

<211> 108

<212> PRT

<213> Homo sapiens

<400> 282

Glu	Val	Gln	Leu	Val	Glu	Ser	Gly	Gly	Gly	Leu	Ile	Gln	Pro	Gly	Gly
1					5			10			15				
Ser	Leu	Arg	Leu	Ser	Cys	Ala	Ala	Ser	Gly	Phe	Thr	Val	Ser	Ser	Asn
					20			25				30			
Tyr	Met	Ser	Trp	Val	Arg	Gln	Ala	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Val
					35			40			45				
Ser	Val	Ile	Tyr	Ser	Gly	Gly	Ser	Thr	Tyr	Tyr	Ala	Asp	Ser	Val	Lys
					50			55			60				
Gly	Arg	Phe	Thr	Ile	Ser	Arg	Asp	Asn	Ser	Lys	Asn	Thr	Leu	Tyr	Leu

65	70	75	80												
Gln	Met	Asn	Ser	Leu	Arg	Ala	Glu	Asp	Thr	Ala	Val	Tyr	Tyr	Cys	Ala
				85		90							95		
Arg	Trp	Gly	Gln	Gly	Thr	Met	Val	Thr	Val	Ser	Ser				
				100		105									

<210> 283
<211> 109
<212> PRT
<213> Homo sapiens

<400> 283															
Glu	Val	Gln	Leu	Val	Gln	Ser	Gly	Ala	Glu	Val	Lys	Lys	Pro	Gly	Glu
1			5				10						15		
Ser	Leu	Lys	Ile	Ser	Cys	Lys	Gly	Ser	Gly	Tyr	Ser	Phe	Thr	Ser	Tyr
			20				25						30		
Trp	Ile	Gly	Trp	Val	Arg	Gln	Met	Pro	Gly	Lys	Gly	Leu	Glu	Trp	Met
			35				40						45		
Gly	Ile	Ile	Tyr	Pro	Gly	Asp	Ser	Asp	Thr	Arg	Tyr	Ser	Pro	Ser	Phe
			50				55						60		
Gln	Gly	Gln	Val	Thr	Ile	Ser	Ala	Asp	Lys	Ser	Ile	Ser	Thr	Ala	Tyr
65				70				75						80	
Leu	Gln	Trp	Ser	Ser	Leu	Lys	Ala	Ser	Asp	Thr	Ala	Met	Tyr	Tyr	Cys
				85				90						95	
Ala	Arg	Trp	Gly	Gln	Gly	Thr	Thr	Val	Thr	Val	Ser	Ser			
				100		105									

<210> 284
<211> 109
<212> PRT
<213> Homo sapiens

<400> 284															
Gln	Val	Gln	Leu	Val	Gln	Ser	Gly	Ala	Glu	Val	Lys	Lys	Pro	Gly	Ala
1			5				10						15		
Ser	Val	Lys	Val	Ser	Cys	Lys	Ala	Ser	Gly	Tyr	Thr	Phe	Thr	Ser	Tyr
			20				25						30		
Gly	Ile	Ser	Trp	Val	Arg	Gln	Ala	Pro	Gly	Gln	Gly	Leu	Glu	Trp	Met
			35				40						45		
Gly	Trp	Ile	Ser	Ala	Tyr	Asn	Gly	Asn	Thr	Asn	Tyr	Ala	Gln	Lys	Leu
			50				55						60		
Gln	Gly	Arg	Val	Thr	Met	Thr	Thr	Asp	Thr	Ser	Thr	Ser	Thr	Ala	Tyr
65				70				75						80	
Met	Glu	Leu	Arg	Ser	Leu	Arg	Ser	Asp	Asp	Thr	Ala	Val	Tyr	Tyr	Cys
				85				90						95	
Ala	Arg	Trp	Gly	Gln	Gly	Thr	Leu	Val	Thr	Val	Ser	Ser			
				100		105									

<210> 285
<211> 109
<212> PRT
<213> Homo sapiens

<400> 285														
Gln	Val	Gln	Leu	Val	Glu	Ser	Gly	Gly	Val	Val	Gln	Pro	Gly	Arg
1				5				10					15	

7
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 286

<211> 108

<212> PRT

<213> Homo sapiens

<400> 286

Glu Val Gln Leu Val Glu Ser Gly Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Gly Ser Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 287

<211> 109

<212> PRT

<213> Homo sapiens

<400> 287

Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Ser Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 288

<211> 109
<212> PRT
<213> Homo sapiens

<400> 288
Gln Val Gln Leu Val Glu Ser Gly Gly Leu Val Lys Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Asp Tyr
20 25 30
Tyr Met Ser Trp Ile Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Tyr Ile Ser Ser Ser Gly Ser Thr Ile Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn Ser Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 289
<211> 109
<212> PRT
<213> Homo sapiens

<400> 289
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 290
<211> 109
<212> PRT
<213> Homo sapiens

<400> 290
Gln Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Ala
1 5 10 15
Ser Val Lys Val Ser Cys Lys Ala Ser Gly Tyr Thr Phe Thr Ser Tyr
20 25 30
Gly Ile Ser Trp Val Arg Gln Ala Pro Gly Gln Gly Leu Glu Trp Met
35 40 45
Gly Trp Ile Ser Ala Tyr Asn Gly Asn Thr Asn Tyr Ala Gln Lys Leu
50 55 60
Gln Gly Arg Val Thr Met Thr Thr Asp Thr Ser Thr Ser Thr Ala Tyr
65 70 75 80

Met Glu Leu Arg Ser Leu Arg Ser Asp Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 291
<211> 109
<212> PRT
<213> Homo sapiens

<400> 291
Glu Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Glu
1 5 10 15
Ser Leu Lys Ile Ser Cys Lys Gly Ser Gly Tyr Ser Phe Thr Ser Tyr
20 25 30
Trp Ile Gly Trp Val Arg Gln Met Pro Gly Lys Gly Leu Glu Trp Met
35 40 45
Gly Ile Ile Tyr Pro Gly Asp Ser Asp Thr Arg Tyr Ser Pro Ser Phe
50 55 60
Gln Gly Gln Val Thr Ile Ser Ala Asp Lys Ser Ile Ser Thr Ala Tyr
65 70 75 80
Leu Gln Trp Ser Ser Leu Lys Ala Ser Asp Thr Ala Met Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 292
<211> 109
<212> PRT
<213> Homo sapiens

<400> 292
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 293
<211> 109
<212> PRT
<213> Homo sapiens

<400> 293
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr

20	25	30	
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly	Gly Leu Glu Trp Val		
35	40	45	
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr	Tyr Ala Asp Ser Val		
50	55	60	
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser	Lys Asn Thr Leu Tyr		
65	70	75	80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala	Val Tyr Tyr Cys		
85	90	95	
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser	Ser		
100	105		

<210> 294

<211> 109

<212> PRT

<213> Homo sapiens

<400> 294

Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg			
1	5	10	15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr			
20	25	30	
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly	Gly Leu Glu Trp Val		
35	40	45	
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr	Tyr Ala Asp Ser Val		
50	55	60	
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser	Lys Asn Thr Leu Tyr		
65	70	75	80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala	Val Tyr Tyr Cys		
85	90	95	
Ala Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser	Ser		
100	105		

<210> 295

<211> 108

<212> PRT

<213> Homo sapiens

<400> 295

Gln Val Gln Leu Gln Glu Ser Gly Pro Gly Leu Val Lys Pro Ser Glu			
1	5	10	15
Thr Leu Ser Leu Thr Cys Thr Val Ser Gly Gly Ser Ile Ser Ser Tyr			
20	25	30	
Tyr Trp Ser Trp Ile Arg Gln Pro Pro Gly Lys Gly	Leu Glu Trp Ile		
35	40	45	
Gly Tyr Ile Tyr Tyr Ser Gly Ser Thr Asn Tyr Asn Pro Ser Leu Lys			
50	55	60	
Ser Arg Val Thr Ile Ser Val Asp Thr Ser Lys Asn Gln Phe Ser Leu			
65	70	75	80
Lys Leu Ser Ser Val Thr Ala Ala Asp Thr Ala Val Tyr Tyr Cys Ala			
85	90	95	
Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser			
100	105		

<210> 296

<211> 109

<212> PRT
<213> Homo sapiens

<400> 296
Glu Val Gln Leu Val Glu Ser Gly Gly Gly Leu Val Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Ser Met Asn Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Tyr Ile Ser Ser Ser Ser Thr Ile Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn Ser Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Asp Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 297
<211> 108
<212> PRT
<213> Homo sapiens

<400> 297
Glu Val Gln Leu Val Glu Ser Gly Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Gly Ser Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 298
<211> 109
<212> PRT
<213> Homo sapiens

<400> 298
Gln Val Gln Leu Val Gln Ser Gly Ala Glu Val Lys Lys Pro Gly Ala
1 5 10 15
Ser Val Lys Val Ser Cys Lys Ala Ser Gly Tyr Thr Phe Thr Gly Tyr
20 25 30
Tyr Met His Trp Val Arg Gln Ala Pro Gly Gln Gly Leu Glu Trp Met
35 40 45
Gly Trp Ile Asn Pro Asn Ser Gly Gly Thr Asn Tyr Ala Gln Lys Phe
50 55 60
Gln Gly Arg Val Thr Met Thr Arg Asp Thr Ser Ile Ser Thr Ala Tyr
65 70 75 80
Met Glu Leu Ser Arg Leu Arg Ser Asp Asp Thr Ala Val Tyr Tyr Cys

85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 299
<211> 109
<212> PRT
<213> Homo sapiens

<400> 299
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 300
<211> 108
<212> PRT
<213> Homo sapiens

<400> 300
Glu Val Gln Leu Val Glu Ser Gly Gly Leu Ile Gln Pro Gly Gly
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Val Ser Ser Asn
20 25 30
Tyr Met Ser Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ser Val Ile Tyr Ser Gly Gly Ser Thr Tyr Tyr Ala Asp Ser Val Lys
50 55 60
Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr Leu
65 70 75 80
Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys Ala
85 90 95
Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 301
<211> 109
<212> PRT
<213> Homo sapiens

<400> 301
Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30

Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 302

<211> 109

<212> PRT

<213> Homo sapiens

<400> 302

Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser
100 105

<210> 303

<211> 109

<212> PRT

<213> Homo sapiens

<400> 303

Gln Val Gln Leu Val Glu Ser Gly Gly Val Val Gln Pro Gly Arg
1 5 10 15
Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Phe Thr Phe Ser Ser Tyr
20 25 30
Gly Met His Trp Val Arg Gln Ala Pro Gly Lys Gly Leu Glu Trp Val
35 40 45
Ala Val Ile Trp Tyr Asp Gly Ser Asn Lys Tyr Tyr Ala Asp Ser Val
50 55 60
Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ser Lys Asn Thr Leu Tyr
65 70 75 80
Leu Gln Met Asn Ser Leu Arg Ala Glu Asp Thr Ala Val Tyr Tyr Cys
85 90 95
Ala Arg Trp Gly Gln Gly Thr Thr Val Thr Val Ser Ser
100 105

<210> 304

<211> 111

<212> PRT

<213> Homo sapiens

<400> 304

Gln Ser Val Leu Thr Gln Pro Pro Ser Val Ser Gly Ala Pro Gly Gln
1 5 10 15
Arg Val Thr Ile Ser Cys Thr Gly Ser Ser Ser Asn Ile Gly Ala Gly
20 25 30
Tyr Asp Val His Trp Tyr Gln Gln Leu Pro Gly Thr Ala Pro Lys Leu
35 40 45
Leu Ile Tyr Gly Asn Ser Asn Arg Pro Ser Gly Val Pro Asp Arg Phe
50 55 60
Ser Gly Ser Lys Ser Gly Thr Ser Ala Ser Leu Ala Ile Thr Gly Leu
65 70 75 80
Gln Ala Glu Asp Glu Ala Asp Tyr Tyr Cys Gln Ser Tyr Asp Ser Ser
85 90 95
Leu Ser Gly Ser Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 305

<211> 107

<212> PRT

<213> Homo sapiens

<400> 305

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Leu
85 90 95
Thr Phe Gly Gly Thr Lys Val Glu Ile Lys
100 105

<210> 306

<211> 107

<212> PRT

<213> Homo sapiens

<400> 306

Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Ser Asn Tyr
20 25 30
Leu Ala Trp Tyr Gln Gln Lys Pro Gly Lys Val Pro Lys Leu Leu Ile
35 40 45
Tyr Ala Ala Ser Thr Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Val Ala Thr Tyr Tyr Cys Gln Lys Tyr Asn Ser Ala Pro Phe
85 90 95

Thr Phe Gly Pro Gly Thr Lys Val Asp Ile Lys
100 105

<210> 307
<211> 107
<212> PRT
<213> Homo sapiens

<400> 307
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Gly Ile Arg Asn Asp
20 25 30
Leu Gly Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Arg Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Glu Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Leu Gln His Asn Ser Tyr Pro Trp
85 90 95
Thr Phe Gly Gln Gly Thr Lys Val Glu Ile Lys
100 105

<210> 308
<211> 107
<212> PRT
<213> Homo sapiens

<400> 308
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Arg Ala Ser Gln Ser Ile Ser Ser Tyr
20 25 30
Leu Asn Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Leu Leu Ile
35 40 45
Tyr Ala Ala Ser Ser Leu Gln Ser Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Asp Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Phe Ala Thr Tyr Tyr Cys Gln Gln Ser Tyr Ser Thr Pro Ile
85 90 95
Thr Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys
100 105

<210> 309
<211> 110
<212> PRT
<213> Homo sapiens

<400> 309
Gln Ser Val Leu Thr Gln Pro Pro Ser Val Ser Ala Ala Pro Gly Gln
1 5 10 15
Lys Val Thr Ile Ser Cys Ser Gly Ser Ser Ser Asn Ile Gly Asn Asn
20 25 30
Tyr Val Ser Trp Tyr Gln Gln Leu Pro Gly Thr Ala Pro Lys Leu Leu

35	40	45													
Ile	Tyr	Asp	Asn	Asn	Lys	Arg	Pro	Ser	Gly	Ile	Pro	Asp	Arg	Phe	Ser
50														60	
Gly	Ser	Lys	Ser	Gly	Thr	Ser	Ala	Thr	Leu	Gly	Ile	Thr	Gly	Leu	Gln
65														80	
Thr	Gly	Asp	Glu	Ala	Asp	Tyr	Tyr	Cys	Gly	Thr	Trp	Asp	Ser	Ser	Leu
														95	
Ser	Ala	Gly	Val	Phe	Gly	Gly	Thr	Lys	Leu	Thr	Val	Leu			
														110	
100															

<210> 310
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 310																	
Glu	Ile	Val	Met	Thr	Gln	Ser	Pro	Ala	Thr	Leu	Ser	Val	Ser	Pro	Gly		
1														15			
Glu	Arg	Ala	Thr	Leu	Ser	Cys	Arg	Ala	Ser	Gln	Ser	Val	Ser	Ser	Asn		
														30			
Leu	Ala	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Gln	Ala	Pro	Arg	Leu	Leu	Ile		
														45			
Tyr	Gly	Ala	Ser	Thr	Arg	Ala	Thr	Gly	Ile	Pro	Ala	Arg	Phe	Ser	Gly		
														60			
Ser	Gly	Ser	Gly	Thr	Glu	Phe	Thr	Leu	Thr	Ile	Ser	Ser	Leu	Gln	Ser		
														80			
Glu	Asp	Phe	Ala	Val	Tyr	Tyr	Cys	Gln	Gln	Tyr	Asn	Asn	Trp	Pro	Ile		
														95			
Thr	Phe	Gly	Gln	Gly	Thr	Arg	Leu	Glu	Ile	Lys							
100																	
105																	

<210> 311
 <211> 110
 <212> PRT
 <213> Homo sapiens

<400> 311																
Gln	Ser	Val	Leu	Thr	Gln	Pro	Pro	Ser	Val	Ser	Ala	Ala	Pro	Gly	Gln	
1														15		
Lys	Val	Thr	Ile	Ser	Cys	Ser	Ser	Ser	Asn	Ile	Gly	Asn	Asn			
														30		
Tyr	Val	Ser	Trp	Tyr	Gln	Gln	Leu	Pro	Gly	Thr	Ala	Pro	Lys	Leu	Leu	
														45		
Ile	Tyr	Asp	Asn	Asn	Lys	Arg	Pro	Ser	Gly	Ile	Pro	Asp	Arg	Phe	Ser	
														60		
Gly	Ser	Lys	Ser	Gly	Thr	Ser	Ala	Thr	Leu	Gly	Ile	Thr	Gly	Leu	Gln	
														80		
Thr	Gly	Asp	Glu	Ala	Asp	Tyr	Tyr	Cys	Gly	Thr	Trp	Asp	Ser	Ser	Leu	
														95		
Ser	Ala	Gly	Val	Phe	Gly	Gly	Thr	Lys	Leu	Thr	Val	Leu				
100														110		
105																

<210> 312
 <211> 107
 <212> PRT
 <213> Homo sapiens

<400> 312

Asp	Ile	Gln	Met	Thr	Gln	Ser	Pro	Ser	Ser	Val	Ser	Ala	Ser	Val	Gly
1					5				10					15	
Asp	Arg	Val	Thr	Ile	Thr	Cys	Arg	Ala	Ser	Gln	Gly	Ile	Ser	Ser	Trp
				20				25					30		
Leu	Ala	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Lys	Ala	Pro	Lys	Leu	Leu	Ile
				35				40				45			
Tyr	Ala	Ala	Ser	Ser	Leu	Gln	Ser	Gly	Val	Pro	Ser	Arg	Phe	Ser	Gly
					50			55			60				
Ser	Gly	Ser	Gly	Thr	Asp	Phe	Thr	Leu	Thr	Ile	Ser	Ser	Leu	Gln	Pro
					65			70			75			80	
Glu	Asp	Phe	Ala	Thr	Tyr	Tyr	Cys	Gln	Gln	Ala	Asn	Ser	Phe	Pro	Trp
					85			90				95			
Thr	Phe	Gly	Gln	Gly	Thr	Lys	Val	Glu	Ile	Lys					
					100			105							

<210> 313

<211> 107

<212> PRT

<213> Homo sapiens

<400> 313

Glu	Ile	Val	Met	Thr	Gln	Ser	Pro	Ala	Thr	Leu	Ser	Val	Ser	Pro	Gly
1					5				10				15		
Glu	Arg	Ala	Thr	Leu	Ser	Cys	Arg	Ala	Ser	Gln	Ser	Val	Ser	Ser	Asn
				20				25				30			
Leu	Ala	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Gln	Ala	Pro	Arg	Leu	Leu	Ile
				35				40			45				
Tyr	Gly	Ala	Ser	Thr	Arg	Ala	Thr	Gly	Ile	Pro	Ala	Arg	Phe	Ser	Gly
				50				55			60				
Ser	Gly	Ser	Gly	Thr	Glu	Phe	Thr	Leu	Thr	Ile	Ser	Ser	Leu	Gln	Ser
				65				70			75			80	
Glu	Asp	Phe	Ala	Val	Tyr	Tyr	Cys	Gln	Gln	Tyr	Asn	Asn	Trp	Pro	Leu
					85			90			95				
Thr	Phe	Gly	Gly	Gly	Thr	Lys	Val	Glu	Ile	Lys					
					100			105							

<210> 314

<211> 107

<212> PRT

<213> Homo sapiens

<400> 314

Glu	Ile	Val	Met	Thr	Gln	Ser	Pro	Ala	Thr	Leu	Ser	Val	Ser	Pro	Gly
1					5				10				15		
Glu	Arg	Ala	Thr	Leu	Ser	Cys	Arg	Ala	Ser	Gln	Ser	Val	Ser	Ser	Asn
				20				25				30			
Leu	Ala	Trp	Tyr	Gln	Gln	Lys	Pro	Gly	Gln	Ala	Pro	Arg	Leu	Leu	Ile
				35				40			45				
Tyr	Gly	Ala	Ser	Thr	Arg	Ala	Thr	Gly	Ile	Pro	Ala	Arg	Phe	Ser	Gly
				50				55			60				
Ser	Gly	Ser	Gly	Thr	Glu	Phe	Thr	Leu	Thr	Ile	Ser	Ser	Leu	Gln	Ser
				65				70			75			80	
Glu	Asp	Phe	Ala	Val	Tyr	Tyr	Cys	Gln	Gln	Tyr	Asn	Asn	Trp	Pro	Phe
					85			90			95				
Thr	Phe	Gly	Pro	Gly	Thr	Lys	Val	Asp	Ile	Lys					

100

105

<210> 315
<211> 110
<212> PRT
<213> Homo sapiens

<400> 315
Gln Ser Val Leu Thr Gln Pro Pro Ser Ala Ser Gly Thr Pro Gly Gln
1 5 10 15
Arg Val Thr Ile Ser Cys Ser Gly Ser Ser Ser Asn Ile Gly Ser Asn
20 25 30
Thr Val Asn Trp Tyr Gln Gln Leu Pro Gly Thr Ala Pro Lys Leu Leu
35 40 45
Ile Tyr Ser Asn Asn Gln Arg Pro Ser Gly Val Pro Asp Arg Phe Ser
50 55 60
Gly Ser Lys Ser Gly Thr Ser Ala Ser Leu Ala Ile Ser Gly Leu Gln
65 70 75 80
Ser Glu Asp Glu Ala Asp Tyr Tyr Cys Ala Ala Trp Asp Asp Ser Leu
85 90 95
Asn Gly Pro Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105 110

<210> 316
<211> 108
<212> PRT
<213> Homo sapiens

<400> 316
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Ser Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Val Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Asn Ser Arg Asp Ser Ser Gly Asn His
85 90 95
Leu Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 317
<211> 108
<212> PRT
<213> Homo sapiens

<400> 317
Ser Tyr Glu Leu Thr Gln Pro Pro Ser Val Ser Val Ser Pro Gly Gln
1 5 10 15
Thr Ala Arg Ile Thr Cys Ser Gly Asp Ala Leu Pro Lys Lys Tyr Ala
20 25 30
Tyr Trp Tyr Gln Gln Lys Ser Gly Gln Ala Pro Val Leu Val Ile Tyr
35 40 45

Glu Asp Ser Lys Arg Pro Ser Gly Ile Pro Glu Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Thr Met Ala Thr Leu Thr Ile Ser Gly Ala Gln Val Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Tyr Ser Thr Asp Ser Ser Gly Asn His
85 90 95
Val Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 318
<211> 107
<212> PRT
<213> Homo sapiens

<400> 318
Asp Ile Gln Met Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Val Gly
1 5 10 15
Asp Arg Val Thr Ile Thr Cys Gln Ala Ser Gln Asp Ile Ser Asn Tyr
20 25 30
Leu Asn Trp Tyr Gln Gln Lys Pro Gly Lys Ala Pro Lys Leu Leu Ile
35 40 45
Tyr Asp Ala Ser Asn Leu Glu Thr Gly Val Pro Ser Arg Phe Ser Gly
50 55 60
Ser Gly Ser Gly Thr Asp Phe Thr Phe Thr Ile Ser Ser Leu Gln Pro
65 70 75 80
Glu Asp Ile Ala Thr Tyr Tyr Cys Gln Gln Tyr Asp Asn Leu Pro Ile
85 90 95
Thr Phe Gly Gln Gly Thr Arg Leu Glu Ile Lys
100 105

<210> 319
<211> 108
<212> PRT
<213> Homo sapiens

<400> 319
Ser Ser Glu Leu Thr Gln Asp Pro Ala Val Ser Val Ala Leu Gly Gln
1 5 10 15
Thr Val Arg Ile Thr Cys Gln Gly Asp Ser Leu Arg Ser Tyr Tyr Ala
20 25 30
Ser Trp Tyr Gln Gln Lys Pro Gly Gln Ala Pro Val Leu Val Ile Tyr
35 40 45
Gly Lys Asn Asn Arg Pro Ser Gly Ile Pro Asp Arg Phe Ser Gly Ser
50 55 60
Ser Ser Gly Asn Thr Ala Ser Leu Thr Ile Thr Gly Ala Gln Ala Glu
65 70 75 80
Asp Glu Ala Asp Tyr Tyr Cys Asn Ser Arg Asp Ser Ser Gly Asn His
85 90 95
Val Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105

<210> 320
<211> 111
<212> PRT
<213> Homo sapiens

<400> 320

Gln Ser Val Leu Thr Gln Pro Pro Ser Val Ser Gly Ala Pro Gly Gln
1 5 10 15
Arg Val Thr Ile Ser Cys Thr Gly Ser Ser Ser Asn Ile Gly Ala Gly
20 25 30
Tyr Asp Val His Trp Tyr Gln Gln Leu Pro Gly Thr Ala Pro Lys Leu
35 40 45
Leu Ile Tyr Gly Asn Ser Asn Arg Pro Ser Gly Val Pro Asp Arg Phe
50 55 60
Ser Gly Ser Lys Ser Gly Thr Ser Ala Ser Leu Ala Ile Thr Gly Leu
65 70 75 80
Gln Ala Glu Asp Glu Ala Asp Tyr Tyr Cys Gln Ser Tyr Asp Ser Ser
85 90 95
Leu Ser Gly Ser Val Phe Gly Gly Thr Lys Leu Thr Val Leu
100 105 110